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THE DIAGNOSIS OF THE RIGHT LOWER QUADRANT

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While appendicitis is by far the commonest surgical lesion of the right lower quadrant of the abdomen, it is important to bear in mind that this region is also the site of numerous other affections which may simulate appendicitis. Moreover, symptoms in the right lower quadrant may attract attention to pathologic conditions situated elsewhere. Some of these conditions require no surgical treatment and others demand operations of considerable magnitude. Some of them are of frequent occurrence and others are exceedingly uncommon. In some cases it will be impossible to differentiate between appendicitis and either a non-surgical condition or one on the other hand which requires involved operative treatment.

The surgeon who exercises the most diligent preoperative study of his patient will be the one who is least frequently surprised at operation. Moreover, he who operates for appendicitis should always be aware of the fact that not only may surgical operations for appendicitis be very difficult indeed, but also that unexpected conditions may sometimes be encountered which will require resection of the right colon or other serious procedures. In case the surgeon finds a normal appendix he should have in mind what lesions to look for which might explain the clinical picture.

A complete history, careful physical examination, and the help of the laboratory and the x-ray department will go a long way toward making a definite diagnosis. Pain must be carefully evaluated. Its duration, migration, intensity, character, and radiations are of first importance. The elicitation of localized tenderness may require considerable patience and resourcefulness, particularly in a young child. The writer always carries a picture of a bear to intrigue his juvenile patient and divert his attention while abdominal palpation is being carried out. The site of the suspected tender area will always be examined last and only after that will rebound tenderness be tested. Examination is usually more easily carried out if the patient's knees are flexed. The examining hand must be warm and gentle.

The demeanor of the patient is very informative. He who has peritoneal irritation or a frank peritonitis will lie quietly in bed, whereas he who suffers from renal colic is restless and twists about in a vain effort to get relief from his pain. Where the lesion is in the abdominal wall, contraction of the abdominal muscles is painful. In intestinal obstruction the acme of the pain is coincident with the loudest borborygmus heard on auscultation.

In most cases of acute appendicitis the diagnosis offers little difficulty. Localized tenderness in the right lower quadrant, pain usually at first near the umbilicus but later in the right lower quadrant, rigidity in the

region of the inflamed appendix, usually emesis, quiet posture, leukocytosis and exclusion of other entities generally suffices to make the diagnosis. It must be remembered, however, that acute appendicitis may occur in the pelvis or on the left side of the abdomen. In the former case a pelvic examination will usually elicit pelvic tenderness. In the latter case a right apex beat will suggest a transposition of the viscera. In chronic appendicitis the pain is milder and is recurrent. Nausea may appear periodically. Localized tenderness is found. The gastro-intestinal x-ray examination is of little if any value in these cases. In appendiceal abscess the outstanding finding is a tender mass in the right lower quadrant or pelvis with a history suggesting a previous recent attack of acute appendicitis.

In cases of calculus of the ureter there may be marked pain, tenderness and rigidity in the right lower quadrant, together with vomiting and leukocytosis. The pain is more severe, however, than that of appendicitis and its onset more abrupt. In renal calculus the pain may be posterior under the twelfth rib or in the flank. In both ureteral and renal calculus the pain is referred to the genitalia or down the anterior aspect of the thigh. Vomiting is a common symptom. Gross or microscopic blood is found in the urine and the intravenous or retrograde urogram is of value.

In movable kidney the pain (Dietl's crisis) is sudden in onset and may be very intense. It is in the kidney region but may be referred down the ureter. It is accompanied by vomiting and even shock. During the attack there is a diminution of the amount of urine passed, but the urine is usually normal in character. There is an absence of fever and leukocytosis.

In infections of the kidney pelvis (pyelitis) there is usually fever, often as high as 102 or 103 degrees, and pus in the urine. If, however, the ureter is occluded by stone, mucous plug, or edema, a retention of urine in the kidney pelvis will take place (hydronephrosis, pyonephrosis). In this event there will be marked tenderness at the angle formed by the 12th rib and spine. Severe pain may be present in the kidney region or the right lower quadrant. Vomiting and leukocytosis are present and often a marked rigidity. It must be remembered that pus may be absent from the urine in these cases due to complete blocking of the ureter, in which event the diagnosis of appendicitis is usually justifiable.

Mesenteric lymphadenitis is primarily a disease of young children and may often be indistinguishable from appendicitis. There is marked abdominal pain which may be localized, to some extent, in the right lower quadrant. Tenderness and rigidity may be marked. The vomiting, leukocytosis and fever add to the difficulty of the differential diagnosis. The resemblance to appendicitis usually makes laparotomy the safest course.

In acute gonorrheal salpingitis there is pain, tenderness and rigidity of the lower abdomen above the symphysis. It may be midline or more to one side or the other. Leukocytosis is moderate and vomiting is uncommon. Fever is often present. Usually there is a vaginal discharge and the cervical smear will be positive for gonococci. On pelvic examination pressure upon the cervix produces pain and there is tenderness in the fornices.

In ruptured ectopic pregnancy the symptoms vary according to the age of the rupture. During rupture of the pregnancy there is a sharp lancinating pain in the lower abdomen which may be more on one side or the other. The cervix is extremely sensitive to movement, and a tender mass may be palpated in the pelvis. Anomalous menstruation is present and the vaginal bleeding may be constant or intermittent. After rupture the signs and symptoms become increasingly those of a severe internal hemorrhage. There will be pallor, thirst, rapid thready pulse and low blood pressure. The abdomen is tender and rigid and presently becomes distended. Rarely a blue discoloration about the umbilicus (Cullen's sign) may be a clue to the presence of blood in the peritoneal cavity.

Right ovarian cyst with a twisted pedicle produces very severe pain of sudden onset. The patient is usually more restless than one with acute appendicitis. Rigidity, tenderness, vomiting and leukocytosis are present. On pelvic examination a tender cystic mass is palpated. Moderate shock is often present.

Acute intussusception is primarily a disease of childhood and commonly starts in the right lower quadrant. The characteristic features are periodic very severe colicky pains, vomiting and bloody mucus in the rectum. The latter may be discovered only by digital examination or it may be evident

upon defecation. In some 60 per cent of the cases a palpable tumor, usually on the right side of the abdomen, is present. The barium enema not only assists in the diagnosis, but occasionally may reduce the intussusception. Chronic intussusception is rare, occurs chiefly in adults and is evidenced by a firm mass usually in the right lower quadrant of the abdomen. The gastro-intestinal x-ray will be of value in the diagnosis.

Acute colitis is seldom confused with a surgical abdominal condition. Although there may be cramplike pain, vomiting, and tenderness, there is little if any rigidity or localization, and diarrhea is a constant finding.

Early carcinoma of the cecum often suggests chronic appendicitis. The vague pain and tenderness in the right lower quadrant is of gradual onset and is unaccompanied by leukocytosis. There is a progressive loss of weight and strength and an anemia. There is a definite variation from the normal bowel habits. As the carcinoma grows, a mass in the right lower quadrant becomes evident and the anemia may reach 30 per cent hemoglobin and 1,300,000 erythrocytes. The diagnosis is made practically certain by the x-ray with contrast media. In some of the later cases ulceration through the wall of the bowel may cause peritoneal irritation with tenderness and rigidity.

Hemorrhage from a corpus luteum of the ovary will cause a very severe pain in the lower abdomen. The patient maintains a quiet posture and the lower abdomen is tender and rigid. Leukocytosis is present, but fever and vomiting are usually absent. The bleeding may be so profuse as to bring about signs of internal hemorrhage. Pelvic examination is unreliable.

Endometriosis may cause the formation of a "chocolate" cyst of the ovary. Rupture of such a cyst may occur during menstruation and is accompanied by a sudden severe pain in the lower abdomen. The pain may pass away entirely after an hour or two, but marked rigidity remains. The leukocyte count is elevated and a pelvic examination may show a little resistance on one side or the other but little if any tenderness.

Cholecystitis may attract attention to the right lower quadrant. A markedly distended and inflamed gall bladder may show a relative absence of symptoms in the right upper quadrant, but in the right lower quadrant there will be pain, tenderness, rigidity and a palpable mass. The additional finding of leukocytosis may make the picture very similar to that of appendicitis.

Regional ileitis is of rather slow onset (three to four weeks) and is accompanied by moderately severe colicky pain in the right lower quadrant. Loss of weight, diarrhea, anorexia, and leukocytosis are usually present. In the typical case a slightly tender movable mass may be palpated. The x-ray findings are generally characteristic.

In some cases of intestinal obstruction the predominant symptoms may be in the right lower quadrant. Adhesions, and rarely carcinoids, involving the terminal ileum, may produce pain, tenderness, and rigidity in the right lower quadrant in addition to vomiting and positive x-ray findings on the "scout" film.

Diverticulitis of the cecum is uncommon. It is characterized by right lower quadrant pain which has developed over several days, tenderness, leukocytosis, moderate rigidity and relative absence of nausea and vomiting. The symptoms and signs may be very similar to that of acute appendicitis.

Affections of the urinary bladder occasionally may have symptoms which suggest right lower quadrant pathology. In cystitis there is lower abdominal pain, frequent painful urination and pyuria. In vesical calculus the symptoms may be much the same, but the outstanding finding in the urine is blood rather than pus. Cystoscopy will be illuminating in either case and the x-ray will be positive in vesical calculus.

The diagnosis of mesenteric thrombosis or embolism may be very difficult. The pain is severe and usually not localized. Vomiting is nearly always present. The condition may be present for up to 10 days without really definite symptoms. There is little tenderness or rigidity. The abdominal cavity may contain fluid and a bloody diarrhea may be present. The presence of a vegetative endocarditis may furnish a clue to the presence of embolism.

In actinomycosis the pain and tenderness is similar to that of appendicitis. The finding of a spontaneous sinus of the abdominal wall or of an intestinal fistula or of an abscess is highly suggestive. The demonstration of the ray fungus and the sulphur granules confirms the diagnosis.

Amebic abscess may occur in the right

lower quadrant as the result of a localized amebic invasion and destruction of the cecal wall. The pain is of slower evolution than that of acute appendicitis. There is a tender mass in the right lower quadrant and the leukocytosis may be high (20,000 to 35,000). An important clue is the persistent diarrhea, and the diagnosis is made positive by finding the endameba histolytica in the stools or in the discharge from the fecal fistula formed after the abscess.

Right-sided pneumonia may simulate an acute intra-abdominal lesion. Usually, however, the respiratory rate is increased and is of the abdominal type unless the diaphragm is involved. The fever is generally higher than that of appendicitis, being 101 degrees or higher. On auscultation of the chest positive findings are usually present, but may occasionally be absent. The right abdomen may present marked rigidity involving the entire extent of the rectus abdominis muscle. A leukocytosis is present and is higher (30,000) than that of appendicitis. The chest x-ray is usually very helpful in making the differential diagnosis.

In perforated duodenal ulcer, and occasionally perforated gastric ulcer, the intestinal contents may gravitate down along the right colon and accumulate in the region of the appendix, directing attention to this point. The history of sudden onset and the marked severity of the pain, together with "board-like" rigidity are important. Leukocytosis is present and occasionally there will be a pneumoperitoneum.

Meckel's diverticulum becomes of surgical interest by inflammation, perforation of an ulcer or hemorrhage from an ulcer. The latter condition is usually silent. In Meckel's diverticulitis there is abdominal pain of inconstant location, but often in the right lower quadrant, tenderness, rigidity and leukocytosis. A mucosal polyp at the umbilicus may furnish a clue. In perforation of an ulcer of a Meckel's dicerticulum the findings are similar except the rigidity is more marked and pneumoperitoneum may be present.

Herpes zoster may closely simulate acute appendicitis. There may be marked pain and abdominal tenderness, and even occasionally rigidity. Tenderness along the courses of the spinal nerves is an important finding, and three or four days after the onset the characteristic skin lesions will be present.

Hemorrhage into or beneath the right rectus abdominis muscle may produce symptoms indistinguishable from an intra-abdominal surgical condition. Hemorrhage beneath the muscle against the peritoneum is most likely to simulate a "surgical abdomen." The pain and tenderness is marked and is centered over the muscle. A history of direct violence is suggestive, but may be entirely absent, as the hemorrhage may result from muscular exertion. The finding of discoloration of the abdominal skin is important evidence. Surgical exploration may be necessary to make the diagnosis certain.

Quite a number of rare conditions will cause pain, tenderness, or mass in the right lower quadrant. These include intussusception of the appendix, phlegmon of the abdominal wall, osteomyelitis of the ilium, psoas abscess, diverticulum of the bladder, tumor of the pelvic bone, tuberculosis of the cecum, aneurysm of the iliac artery, polyposis of the cecum, and carcinoma of the stomach with extreme dilatation.

PLASTIC SURGERY IN RELATION TO MOTOR ACCIDENTS*

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The number of motor driven vehicles registered in the United States has increased almost forty per cent during the last decade. The incidence of motor accidents has followed this increase and the annual toll has become alarming.

The speed of the automobile is far greater now than it was ten years ago, and with the increase in speed, safety devices have not been developed to safeguard the drivers and the passengers. Experimental traffic regulation studies are being carried on, but, as yet, the problem remains unsolved. Changes in the design and structure of the automobile have been accompanied with characteristic types of injuries. Broken wrists were common before the self starter was invented. The advent of the bumper was followed by many broken knees and legs. Today we are confronted with certain types of injuries that have resulted from the change in design of the interior of the automobile as well as its mechanics, for example, high speed motors, transmissions, and hydraulic brakes. Unfortunately, the exposed portions of the human anatomy, chiefly the face, head and neck, are most often injured.

The complication of the anatomy and the conspicuousness of the part frequently injured have created a demand for more skill in the treatment of victims of motor accidents. Frequently, the injuries involve not only the exposed parts; internal organs, the brain, and long bones may be involved, and these cases require the assistance of surgeons skilled in their care.

People are more sensitive regarding their appearance than formerly because today people are confronted with a more competitive struggle for existence. The psychological effects of ugly scars and deformities may cause the bearer to lose his economic and social status.

Although injuries of the face constitute only a portion of the casualties, they are vitally important because the special senses are often affected. Facial deformities are conspicuous and the victim is subjected to mental as well as physical distress.

The principles of treatment as outlined in this paper will be confined largely to the care of soft tissue injuries, with a few remarks about injuries of the facial bones.

The proper initial treatment of lacerated wounds lessens the chance of unsightly scars. A properly closed wound usually will require no further treatment. There are certain factors in the healing of wounds, however, over which the surgeon has no control. The correct treatment of injuries is the greatest safeguard against complications and deformities.

An examination of the patient should precede any type of treatment. The initial examination should be thorough, covering the entire body, beginning with the head and continuing through the extremities. If this procedure is routinely followed, fractures and lacerations, other than those that are obvious, will not be overlooked, and much embarrassment may be avoided.

The examination, of course, follows the usual routine of observation and palpation. Care should be taken not to overlook fractures because of swelling. Palpation should be bilateral for comparison, beginning with the orbital ridges and continuing with the malar, the zygomatic bones and processes, until the whole bony facial structure has been thoroughly investigated. Fractures of the maxilla and the mandible are recognized by intra-oral examination. X-rays are a great aid in establishing the presence of fractures and the position of the fragments. Frequently, however, the x-rays cannot tell the whole story because of the difficulty in obtaining the correct exposure to portray the displacement of the fragments. Other laboratory aids to diagnosis come under special fields—for example, urinalysis and spinal puncture.

Haste may be responsible for disappointment on the part of the operator. Overlooking injuries and subjecting the patient to unnecessary trauma when his condition contra-indicates it may end in disaster and all due to too much haste. The immediate treatment of the injured has to do with

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maintaining a live patient. A carefully sutured lacerated face is useless to a dead patient. If the patient is in shock, heat to the body, stimulants, fluids by vein and all other



Fig. 1. *(left)* The patient was riding in the front seat of an automobile and was thrown against a rear-view mirror. She received two parallel, irregular lacerations of the right upper eyelid.

Fig. 2. *(right)* Results obtained after the wounds were excised to make a single one with regular edges. The latter was closed using three layers of sutures.

accepted anti-procedures should be instituted to combat shock. Hemorrhage should be checked. Temporary dressings should be applied to the wounds to avoid added contamination during the first aid treatment. Cultures taken at random from the street dirt have shown the presence of tetanus bacteria in spite of the few horses on the street. It is generally agreed that all the victims of street accidents should be given, immediately, a prophylactic dose of anti-tetanus serum.

Before any procedure is begun for closing wounds, all the usual surgical procedures for cleanliness should be carried out. The field, and this includes a large area, should be free of dirt and hair. Hair bearing areas should be shaved, but care should be taken not to lose the contour and landmarks. After all the dried blood and gross particles have been removed, the skin is thoroughly cleansed with soap and water (tincture of green soap) and this is followed by alcohol. Strong antiseptics are avoided because of the danger of devitalizing fresh tissue. The important fundamentals of debridement are thorough mechanical cleaning of the wound, careful examination of all the pockets of the wound for foreign bodies, and the removal of all blood clots and loose tissue fragments.

Frequently lacerations are so extensive that the length of time required for careful closure contraindicates a general anesthetic. Young children and hypersensitive adults must be given a general anesthetic. One per cent novocaine with fifteen minims of adrenalin per ounce gives adequate anesthesia.

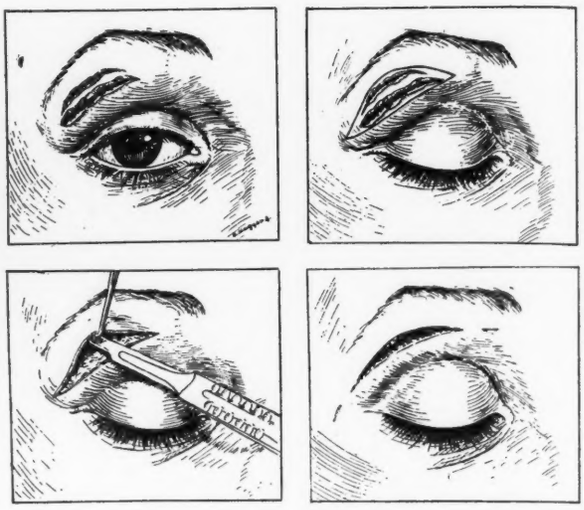


Fig. 3. *(above) (a)* A sketch of the lacerations shown in Figure 1. *(b)* An elliptical section of skin was excised as shown.

Fig. 4. *(below) (a)* The edges of the wound were undermined to allow for ease in closing the wound without any tension on the suture line. *(b)* The wound is partially open to show the dermal intercuticular sutures in place.

Block and infiltration may be used, depending on the region to be anesthetized.

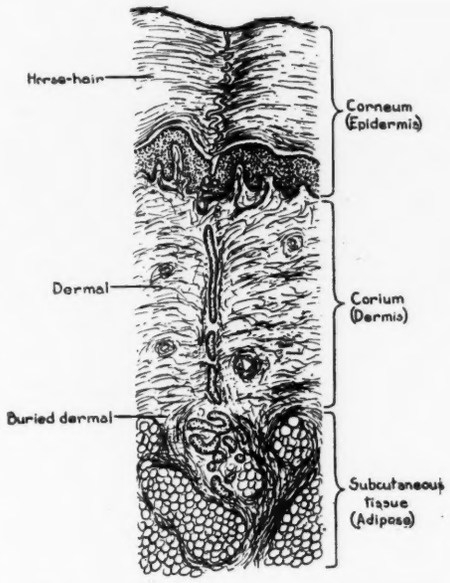
Hemostasis is as necessary in wounds about the head as elsewhere. Capillary oozing can be controlled with pressure or hot applications. Larger vessels should be clamped and usually no ligature is necessary. Still larger vessels should be isolated, clamped and tied with fine catgut. Small mosquito forceps should be used for isolating the vessels and only the vessel should be tied to avoid necrosis of tissue.

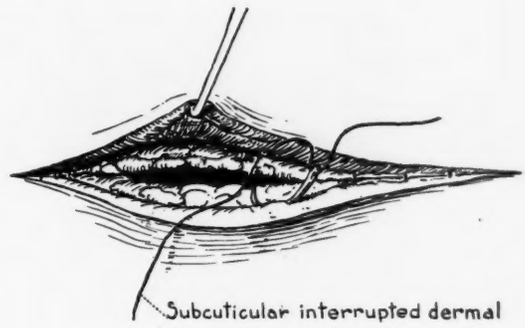
The edges of irregular wounds are excised to straighten them before suturing. (Figs. 1 and 2). Contused wound edges should be excised in order to bring healthy tissue into approximation. Sharp corners should be eliminated because of necrosis which usually follows due to inadequate blood supply.

The excision of the wound edges is done using a sharp scalpel, and great care should be employed to make the fresh skin edges vertical. Bevelled edges may result in keloids and more conspicuous scars. The wound edges are undermined in order to bring them into approximation without tension at the suture line (Figs. 3-*a*, and *b*, and Figs. 4-*a*, and *b*).

Surgeons for many years have realized

that when human tissue is severed, sewing or suturing is desirable to maintain the edges of the opening in their proper position until healing has progressed to the point where such support is no longer needed.





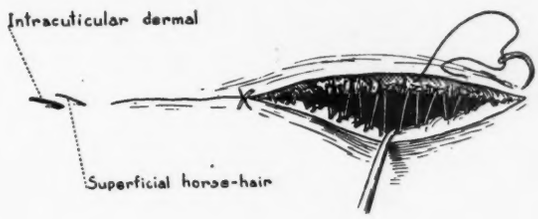


Fig. 5. *(left)* A drawing to show the layers of the skin and the level in which the three types of sutures are placed.

Fig. 6. *(upper right)* Interrupted fine dermal sutures placed at a level just below the corium. The knots are placed at the lower part of the suture.

Fig. 7. *(lower right)* The intra (or inter) cuticular dermal is placed in the dermis. The superficial layer of horse hair is placed in the epidermis. These are continuous sutures laced back and forth the entire length of the wound, coming to the outside about every 1¼ inches to facilitate removal.

Skin clips should never be used for closing wounds of the face. They should not be used for temporary closure. Suture materials of a large gauge should not be used, such as heavy catgut and silkworm gut. Dermal suture is well tolerated and has good tensile strength. Dermal sutures are made of long fiber strands of twisted silk impregnated with a special gum to give them strength, smoothness and non-capillarity. Certain sutures—for example, plain silk and linen—are capillary, so that fluid, perhaps carrying bacteria, can travel along them to internal tissue. Horse hair is fine and has little tensile strength, but used in the skin surface is adequate to maintain approximation of skin edges. Needles should be of fine gauge, such as those used by the eye surgeon. Skin-hooks should be used to hold the skin edges while suturing instead of forceps. The latter may pinch the tissue, causing necrosis.

The technic of suturing is more complicated than simply placing interrupted sutures. These can only be allowed to remain a short time in order to avoid "stitch marks." The proper closure of a facial wound is done by first using deep subcutaneous interrupted sutures (Figs. 5 and 6). Fine dermal material is used and the knot is inverted into the depth of the wound. The

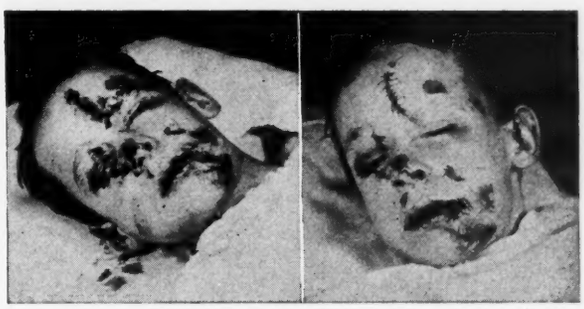


Fig. 8. *(left)* This boy was cut by broken glass from a headlight of a truck which struck him. His general condition necessitated a rapid closure of the wounds.

Fig. 9. *(right)* The wounds were closed with interrupted subcuticular dermal and interrupted horse-hair sutures tied only once to eliminate knot pressure scars.

second layer of sutures is a continuous thread of fine dermal. This is placed in the dermis, beginning away from the wound and entering it at the proper level. The dermal suture is laced back and forth through the length of the wound and makes its exit just as it entered (Fig. 7). The third (superficial) layer of sutures is horse hair. This is placed in the same way as the second (dermal) layer, but in the epidermis (Fig. 7). Extreme care must be taken in

placing this layer of sutures in order to obtain as nearly microscopical approximation of the wound edges as possible. Occasionally, a few interrupted horsehair sutures are required to obtain accurate opposition at the surface. These should be tied only once to avoid knot pressure scars (Figs. 8, 9, 10-*a*, *b*, *c*, and 11-*a*, *b*, *c*).



Fig. 10. *(a)* This patient was thrown forward against the instrument panel of an automobile. The laceration of his scalp and forehead exposed his skull bone and a flap was raised medially. The laceration along the side of his nose exposed the nasal septum. *(b)* The wounds were closed with three layers of sutures. A few interrupted horse-hair sutures tied only once were placed to accurately approximate the epidermis. *(c)* The results after healing had taken place. No "stitch-marks" are present.



Fig. 11. *(a)* The patient was riding in the rear seat of an automobile. The driver applied the brakes suddenly and she was thrown forward against the edge of the robe rail. *(b)* The laceration extended through the lateral nasal wall and septum and into the inner canthus of her left eye. There was an entire section of her left upper eyelid severed. *(c)* Results obtained by carefully closing the wounds, placing sutures below the surface after the edges were freshened and made regular.

When there is a loss of an area of skin too large to close by suturing, a full thickness graft may be employed to cover the defect immediately. The full thickness graft may be taken from behind the ear, or the inner surface of the arm. The skin in these regions is of fine texture and non-hair bearing and matches the facial skin closely, especially the post-auricular.

"Brush burns" should be thoroughly scrubbed with tincture of green soap and a stiff brush (Figs. 12-*a*, *b*, *c*, and 13). The ground in foreign bodies, such as minute particles of gravel and stone which are embedded in the skin, must be removed with a small instrument. This is very tedious work but the patient will be grateful.

Pressure bandages may be applied over wounds that have been extensively undermined. Pressure bandages may consist of gauze or sea sponge held in place by roll bandage or adhesive strapping. When a pressure bandage is not needed, collodion-gauze dressing may be used over the wounds. Fine mesh roll bandage cut in sections to cover the wounds are held with collodion. They may be readily removed with acetone solution. Applications of these collodion dressings should be continued for three weeks to reinforce the healing wound and avoid wide scars. Cotton should never be placed over wounds directly, because such a dressing results in matting and favors suppuration.

The optimum temperature for wound healing is body temperature. Therefore, avoid the necessity for ice bags to promote hemostasis.

The use of fine suture material and early removal of sutures should be kept in mind to avoid "stitch marks." Superficial horse hair as so designated in this paper, and interrupted horse hair, should be removed in 36 to 48 hours. The inter-cuticular dermal may be allowed to remain seven days or longer.



Fig. 12. *(a)* This patient was struck by an automobile and dragged underneath it. A large flap of scalp tissue was evulsed exposing the skull bones. The laceration extended to just below the outer canthus of the right eye. There were "brush-burns" over the entire right side of her face and neck. *(b)* and *(c)* The result obtained is shown. The scalp and face wound was filled with hair, broken glass and street dirt. This was carefully removed mechanically and the wound was washed with saline. The wound edges were freshened and made regular. The flap was replaced and the wound closed with three layers of sutures. A pressure bandage was applied. The "brush-burns" were thoroughly scrubbed with a stiff brush and tincture of green soap. The denuded areas were covered with gauze impregnated with oxyquinalin scarlet-red ointment.

Facial wounds are all potentially infected. The bacterial invasion is rapid even in the absence of foreign bodies. They may gain their entrance through the broken skin, or through the nasal and oral cavities, if there is communication. Fine flat rubber drains should be inserted into wounds which have been allowed to remain open for twelve hours or more. Deep wounds that expose bone or which communicate with a fractured bone should have drainage established.

If treatment is not instituted for 24 hours, it is better to cover the wound with hot sterile packs for a few hours and close the wound later to minimize secondary scar formation.

The location and direction of the laceration and infection are important factors in minimal scar formation. The tendency to keloid formation in certain people cannot be controlled. It is not infrequent that patients need secondary operations for the removal of scars.

Fractures of facial bones should be reduced as early as the patient's condition will allow. Too early manipulation is harmful if the patient has a brain or skull injury. The choice of method of immobilization of the jaws depends on the individual case. Inter-maxillary wiring is the simplest and most effective method. Dental plates may be used as splints in edentulous cases.



Fig. 13. This boy was struck by an automobile and dragged for several feet. His face, especially the left side, was "brush-burned." Due to his condition the wounds were allowed to heal without treatment and there resulted the "tatoo" carbon scars shown in the dark areas. (Compare with Figure 12.)

Depressed malar bones may be raised by one of several ways, but through an oral approach a facial scar can be avoided.

Fractured nasal bones should be molded into position and held by internal or external pressure. The septum, if injured, should be straightened as well as possible.

References

1. Aufricht, Gustave: Immediate transplantation on defects due to accident. Arch. Otolaryng., vol. 17, (June) 1933.
2. Bettman, A. G.: The psychology of appearances. Northwest Med., 28: No. 4, (April) 1929.
3. Evans, S. S.: Fractures about the orbit. Southern Med. Jour., 26: No. 6, (June) 1933.
4. Federspiel, M. N.: Maxillo-facial injuries. Wisconsin Med. Jour., (August) 1934.
5. Halsted, W. S.: Jour. A.M.A., p. 1119, (April 12) 1913.
6. Hunt, H. Lyons: Plastic Surgery of the Head, Face and Neck. Lea and Febiger, 1926.
7. Ivy, Robert H.: Injuries of the bones and soft tissues of the face. Penn. Med. Jour., (August) 1932.
8. Kazanjian, V. H.: Injuries to the face and jaws resulting from automobile accidents. Trans. Acad. Ophthalmol. and Otolaryng., 1933.
9. Kazanjian, V. H.: Traumatism of the face and jaws with special reference to complications. Jour. A.D.A., 21: (July) 1934.
10. Safian and Tamerin: Recent fractures of the nose. Amer. Jour. Surg., 31: No. 1, (Jan.) 1936.
11. Straith, C. L.: Personal communications.
12. Woodward, F. D.: The management of recent fractures of the nose and sinuses. Ann. Otol., Rhinol. and Laryngol., 44: No. 1, (March) 1935.

FRACTURE OF THE NECK OF THE FEMUR*

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Fracture of the neck of the femur has always been recognized as a most difficult fracture to treat. To the difficulty many factors contribute. Of these the most important can be placed in three classifications, constitutional, anatomical and mechanical.

The constitutional factors arise from the fact that most victims of fractures of the neck of the femur are elderly people, to whom any accident is a serious matter. Their vital forces are at a low ebb, and their circulations are poor, so that pneumonia, digestive disturbances, and exhaustion are apt to follow any treatment which involves long confinement in bed.

The anatomical factors arise, first, from the arrangement of the blood supply of the neck. In its outer or trochanteric portion the neck is well supplied with blood from the nutrient arteries and from the periosteum, but in its inner or intracapsular portion the blood supply comes principally from the neck, whose blood vessels cross the epiphyseal line, to vessels which enter the head along the edge of the articular surface close to the epiphyseal line, from a possible periosteal source within the capsule (Kolodny) and rarely, in elderly people, the ligamentun teres. The hip capsule is the source of some of these vessels. Fracture through the neck must always tear the capsule to a greater or less extent, thereby cutting off some of the blood from the proximal fragment and head, and all the blood which comes from the trochanteric region. The remaining epiphyseal supply is poor. Thus the blood supply to the proximal fragment must be inadequate after any fracture of the neck, and its bone-forming powers are therefore slight. This fact in itself is enough to account for the slow healing which always occurs, and the nonunion, which often occurs in fractures of the neck even with best of treatment. The better blood supply accounts for the fact that fractures in the trochanteric region must always unite promptly, even under indifferent treatment.

If a fracture of the neck is not accurately reduced there is little or no chance for the head to acquire a good blood supply.

If the reduction is good, then there is the probability of new vessel formation from the trochanteric region across the line of fracture.

Another anatomical factor arises from the fact that there are no ligamentous or muscular attachments to the head. The head therefore cannot be controlled or manipulated. The distal fragment must be brought into line with it.

The mechanical factors arise principally from the fact that the fracture is so deeply placed that no direct manual control of it is possible and efficient retentive apparatus is hard to construct. Even a double plaster spica is insecure in heavy patients.

The older methods of treatment, such as sandbag fixation in bed, simple splints, and traction, were unsatisfactory. Although occasional patients got good bone union, fibrous union and permanently unstable hips were the rule. The search for better methods began long ago and many forms of treatment have been devised. They are of two general types, those which employ closed reduction with some method of external fixation, and those which employ

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either open or closed reduction with some form of internal fixation. It is worthwhile to review some of these. In 1918 R. Whitman[14] of New York published his method of closed reduction. It was the most carefully reasoned scheme up to that time. It consisted essentially of manipulation under a general anesthetic in which traction brought the outer fragment down to its normal level, and restored the normal angle of the neck and then forcible internal rotation and wide abduction brought the fractured surfaces into accurate contact and locked them there. Both legs and the pelvis were then placed in a well fitted plaster spica, which was left in place for three to six months. The method depends for its success on the use it makes of the Y ligament of Bigelow, which is usually intact, to pull the proximal fragment into alignment with the distal. This method was adopted almost universally. In 1933 Leadbetter[6] modified the Whitman method by applying the tractive effort and the internal rotation while the hip was flexed at a right angle. This was an improvement, as it made reduction less difficult. These two methods have now generally replaced all other methods of closed treatment. By their use a fracture of the neck of the femur can be reduced satisfactorily and the reduction maintained. Both methods require long confinement to bed. Kleinberg[5] has recently overcome this objection by getting the patients treated by this method up on crutches in their plaster spicas, and allowing them to bear weight on the injured hip.

Unfortunately, no matter how perfect the reduction may seem to be, bony union does not always follow. In fact, failure to unite is discouragingly frequent. A committee of the American Orthopedic Association, two years ago, reported after a country-wide investigation, that in well recognized clinics the percentage of failure ran as high as fifty. Only 50 per cent got good union by the closed methods. Dr. Whitman's clinics in New York report a much higher percentage of sucess, probably due to more intimate acquaintance with the method.

The poor results of conservative treatment of this fracture long ago led to attempts to improve them by means of open operation and internal fixation. Most of these, until recently, were directed toward the amelioration of the sufferings of patients whose fractured hips had failed to unite after many months of treatment. As long ago as 1858 Von Haugenbeck[12] did an open reduction and fixation of an ununited fracture by means of a screw. Death resulted. Loretta,[7] in 1888, attempted to wire an ununited fracture. Although the wiring failed, the fracture healed. Mueller,[9] in 1896, cured a long standing case of nonunion by inserting a drill obliquely through the trochanter and head, using an anterior wound. Willy Myer,[10] in 1893, used nails. Sayre, in 1898, used a gimlet. I myself helped nail an ununited fracture in 1904 through a small trochanteric incision, using a four inch ordinary iron spike. Not until Albee reported his method in Murphy's "Clinic," June, 1913, was surgical interferences in these fractures put on a sound basis. His method consisted of open reduction through an anterior incision, followed by a second incision over the trochanter. Through this latter incision a drill was passed obliquely upward through the trochanter into the head, its course being guided by observation, through the anterior incision. A dowel was then made from a tibial graft which exactly fitted the drill hole. This was firmly driven home, the wound closed and a plaster-of-Paris spica applied. Albee correctly claimed for his method accuracy of reduction, solidity of fixation, on physiological principles, no foreign bodies, and stimulation of bone repair by the graft. The objections to his method, which have gradually forced it into disuse, are the magnitude of the two operations involved, the difficulty of accurate placing of the drill and accurate fitting of the graft and the fact that the graft sometimes broke and nonunion resulted. To my mind the operation still holds a place for the treatment of ununited fractures in patients who are good surgical risks. This operation was not primarily intended for use in fresh fractures, but it set men thinking in terms of accurate surgery in regard to fresh hip fractures.

The modern popularity of surgical treatment may be said to have begun when Smith-Peterson[11] published his article on the successful results in twenty-four cases of fresh fractures operated upon between 1925 and 1930 by his open reduction method, after which he used a three flanged nail, placed under visual guidance, through the trochanter and neck, for fixation. Smith-

Peterson used the three flanged nail because it could be made very strong with a thin cross section which did not split bone, and because it had a large area for frictional grip on the cancellous bone of the neck and head. Smith-Peterson's method was greeted with keen interest, but some doubt, this latter principally directed at the severity of the double operation, and the use of a foreign body. The fundamental value of the principles of the Smith-Peterson procedure was promptly recognized and a host of men rushed into the field with operations designed to correct the faults or improve on the advantages of the operation. Johannsen[3] of Sweden used a nail which is perforated to fit over a guide wire previously inserted in the proper position in the trochanter and head. Westcott[13] of Virginia first suggested that the open reduction of the Smith-Peterson procedure be replaced by closed reduction and nailing through a single trochanteric incision under the guidance of repeated x-rays. King[4] of Australia used a cannulated nail with two wire guides under fluoroscopic control. Gaenslen,[1] in 1935, suggested that heavy wire spikes be substituted for the nail and that five or six of them be driven subcutaneously at slightly different angles. His idea was to avoid the necessity of any open incision. Moore,[8] in 1936, suggested three heavy wire nails driven at different angles. These nails have screwheads on which lock nuts are placed. These nuts are for two purposes: first, to hold the trochanter from backing away from the head, and, second, to prevent the nails from working inward and entering the pelvis. Henderson[2] has just reported the use of a lag screw. These and many other slightly different schemes have been used with success. In spite of them nonunion still occurs occasionally.

Most of these methods of internal fixation have been in use long enough to permit evalution of their advantages and disadvantages in the treatment of fresh fractures. All reports of series of cases treated by internal fixation show a much better percentage of bony union than do those treated without operation. Some of them give one hundred per cent of success. The immediate mortality of the operative procedure was higher than the closed methods until open reduction of the fracture was abandoned in favor of the so-called "blind nailing." Since then it has been lower because immediate physical activity is allowable and confinement to bed is short. After the nonoperative treatment fixation of the knee and hip for long periods was necessary. After internal fixation this period of fixation is short, and sometimes absent. Thus by the time the patient whose hip has been nailed has sufficient union to justify weight bearing, the knee and hip are movable and the muscles are in good condition. There is no comparison between the comfort of the two methods to the patient. The elderly person in a double plaster-of-Paris spica is uncomfortable, to put it mildly. The nailed patient needs no such plaster, and is free to move about in bed from the first. He is infinitely easier, therefore, to nurse. The nailed patient can be gotten up in a wheel chair in a month and on crutches within eight weeks. Weight bearing on the nail, if it is properly placed, even though bony union is not complete, may be allowed at this time.

For all these reasons I am persuaded that some form of internal fixation is the best for fresh fracture of the neck of the femur. Personally I prefer the Smith-Peterson nail, as modified by White, driven through a trochanteric incision. I use a guide wire and repeated x-ray control. Gas-oxygen, avertin or local anesthesia may be used. The operation should be done as soon as the patient has recovered from shock and before pneumonia or intestinal stasis has time to develop. To my mind the operation is technically very difficult and should not be attempted except under the most favorable surroundings, where skilled help, first class x-ray equipment, personal and perfect operating room technic are at hand. If such conditions are not obtainable the Whitman or Leadbetter method of closed reduction should be used.

Bibliography

1. Gaenslen, F. J.: Jour. Bone and Joint Surg., 17:739-748, (July) 1935.
2. Henderson, M.: Arch. Surg., 35:419-430, (Sept.) 1937.
3. Johannsen, Sven: Acta. Chirurg. Scandinavia, (Sept.) 1932.
4. King, T.: Med. Jour. Australia, (Jan.) 1934.
5. Kleinberg, S.: Jour. Bone and Joint Surg., 17:1041-1044, (Oct.) 1935.
6. Leadbetter, G. W.: Jour. Bone and Joint Surg., 15: 931-940, (Oct.) 1933.
7. Loretta: British Med. Jour., Aug. 25, 1888.
8. Moore, A. T.: Surg., Gynec. and Obst., 64:420-436, (Feb.) 1937.
9. Mueller: Samm Klin, Verte, No. 145, 939, 1896.
10. Myer, W.: Ann. Surg., 11:30, 1893.
11. Smith-Peterson, M. N., Cave, E. F., and Vangorder, G. W.: Arch. Surg., 23:715-759, (Nov.) 1931.
12. Von Haugenbeck: Charité annalen, 1858.
13. Westcott, H. H.: Va. Med. Monthly, (July) 1932.
14. Whitman, R.: Surg., Gyn. and Obst., 27:575, (Dec.) 1918.

PRIMARY CARCINOMA OF THE JEJUNUM

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Primary carcinoma of the jejunum is not only an infrequent lesion, but an interesting one as well, because of the difficulty in making an early diagnosis, the irregularity of the symptoms, and the unusual response to surgical treatment.

Although the jejunum is the most frequent site for carcinoma of the small intestine, the incidence is only 0.15 per cent of all gastro-intestinal carcinomas, according to the most recent survey by Mayo and Nettrour.

We wish to add two cases to the existing small list of reported cases, and, in doing so, compare the symptoms presented in our cases, each differing widely in symptomatology, with the usual symptoms of the cases reviewed in the literature on this condition.

Epigastric distress is the most common symptom of this disease, and may vary in intensity from real severe to dull pain, cramps or discomfort. One of our cases had dull, gnawing pains off and on for seven months, and constant pain for two weeks prior to admission to the hospital. The other case was free from pain.

Anemia is quite constant in most of the reported cases, and many writers have advised suspecting carcinoma of the small bowel in all cases of unexplained anemia. Plunkett, Foley and Snell have explained that the anemia may result from both the occult bleeding and the interference with the absorptive function of the small intestine. The presence of occult blood in the stool with anemia should always lead one to suspect intestinal malignancy. Anemia was the outstanding symptom in one of our cases, and he had been under treatment for this condition with iron and liver extract for six months prior to admission to the hospital. The other case showed a slight degree of anemia in his blood count, but no apparent anemia in his general appearance.

Loss of weight is usually present, and it occurred in both of our cases, one having lost forty pounds in a year, and the other twelve pounds in four weeks. Heartburn, indigestion, nausea and vomiting are variable symptoms, and were present in only one of our cases. There was no loss of appetite in either case.

Many cases have constipation or diarrhea, and increasing constipation was an outstanding symptom in one of our patients, while the other had regular normal stools.

A tumor mass in the upper abdomen is usually a late finding in this disease, and was present in one of our cases.

Roentgenological examination was carried out in our first case and showed a definite obstruction of the jejunum about eighteen inches from the pylorus. In the second individual, an incomplete roentgenological examination was done seven months prior to admission to the hospital, with negative results, and, as a large tumor mass in the upper abdomen was discovered shortly before operation, we deemed an x-ray inadvisable.

The first case presented a small annular lesion, the second a large tumor mass. Both were advanced adenocarcinoma; in the first there were small glandular metastases and none were present in the second. In the first case a resection and an end-to-end anastomosis was performed, and in the second a resection and a lateral anastomosis was done on account of the edema in the wall of the adjacent small bowel. Enterostomy was performed distal to the anastomosis in both instances.

Both patients made uneventful recoveries and are alive, well, and apparently in good physical condition, twenty-eight and eighteen months, respectively, after operation.

Case 1.—W. G., a white man, aged fifty-seven, whose occupation was office clerk, was admitted to Harper Hospital February 6, 1936, when he complained of indigestion, heartburn and eructations of gas for one year, and nausea and vomiting for one week. He never had any abdominal pain or soreness. His appetite was always good, and even during the past week, when he had had considerable nausea and vomiting after eating.

He had lost about twelve pounds in the last four weeks. The bowels were always regular, and the stools were normal in appearance.

His family and past history were negative. He had had good health until the present illness.

Physical examination revealed a well nourished white male, not acutely ill, but somewhat dehydrated. The blood pressure was 140/80. The only positive finding was moderate upper abdominal distention and tympany. There was no abdominal tenderness.

Laboratory findings: Urinalysis—slight trace of sugar. Blood count: Hemoglobin 79 per cent, erythrocytes 4,970,000, leukocytes 9,200, polymorphonuclears 71 per cent, large lymphocytes 26 per cent, mononuclears 2 per cent, basophiles 1 per cent. Kahn test negative. Blood nitrogen 34.2 mmgs. Blood chlorides 495 mmgs.

Roentgenological examination with the barium meal showed a large stomach with practically total retention at four hours, and marked retention at twenty-four hours. Marked dilatation of the proximal jejunal loop with obstruction of the jejunum about eighteen inches from the pylorus.

A Levine tube was passed and attached to a suction apparatus. The patient was given clear fluids freely by mouth and glucose in saline solution intravenously.

Operation was performed February 11, 1936, by means of 150 mgms. novocaine spinal anesthesia. A five-inch left paramedian incision was made. No free fluid was found in the abdominal cavity. The liver was normal. The gall bladder was distended, but no stones were palpated.

The stomach was slightly dilated. The duodenum felt normal. There was an annular obstructing lesion in the jejunum about 7 inches from the duodeno-jejunal junction. No glands were felt. A resection was done with a wedge-shaped resection of the mesentery, and an end-to-end anastomosis performed. Distal Witzel type enterostomy was then done and the wound closed in the usual manner. A prophylactic dose of tetanus-gas gangrene serum was given.

Pathological examination.—Gross: A moderately indurated circular fungating mass involving the entire wall of small bowel was found. Serosa border had been ulcerated through and was constricted. Microscopical: Advanced adenocarcinoma. Metastatic in adjacent lymph node.

Postoperative treatment consisted of reattaching the Levine tube, which was left in during the operation, to a suction apparatus. Subcutaneous and intravenous fluids were freely given. Mouth hygiene was watched and the patient was given fruit candies to suck. Clear fluids were given by mouth on the second day. Saline and glucose solution was inserted into the enterostomy tube every two hours. The Levine tube was removed on the fifth day and a light soft diet was given. The instillations into the enterostomy tube were discontinued on the sixth day, and the tube came out spontaneously on the tenth day. The patient was sitting up in bed on the tenth day, was up in a chair on the twelfth, and was walking on the fourteenth day. The wound healed by primary union and the patient was discharged from the hospital on the sixteenth postoperative day.

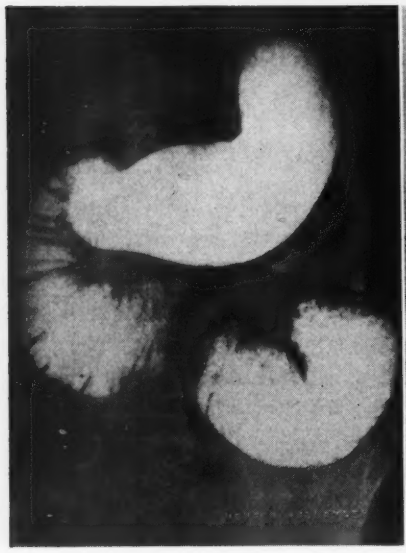


Fig. 1. Case 1. Radiograph showing dilatation of the jejunum proximal to growth.



Fig. 2. Case 1.

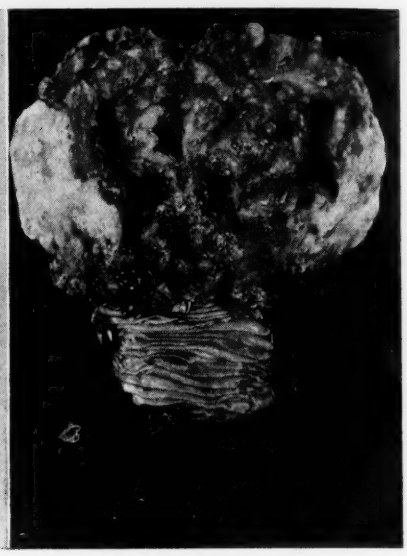


Fig. 3. Case 2.

The patient gained 10 pounds in weight during the month after leaving the hospital. He has been in perfect health since and is being kept under observation.

Case 2.—F. N., a white man, aged sixty-five, occupation—painter, was admitted to Harper Hospital when he complained of increasing weakness, loss of forty pounds in weight and increasing constipation for the past year; dull, gnawing pain in the upper abdomen for seven months, constant for the prior two weeks. His appetite had been good, but lately he had a feeling of fullness after eating. He had been taking iron tonic and getting hypos of liver extract for the last seven months. He has had frequency of urination day and night for the past three months.

The family and past history are negative. He had always been in good health except for one attack of influenza years ago. He did not use tobacco or alcohol.

Physical examination revealed a well developed white male, not acutely ill, but showing definite signs of emaciation and anemia. The blood pressure was 118/76. The only positive findings were a slight systolic heart murmur, a few fine crepitant râles over the bases of both lungs, a large soft prostate, and a large round, smooth, tender movable mass just to the right of the umbilicus.

Laboratory findings: Urinalysis was negative.

Blood count: hemoglobin 55 per cent; erythrocytes 4,020,000; leukocytes 12,100; polymorphonuclears 70 per cent, lymphocytes 20 per cent, eosinophiles 9 per cent, basophile 1 per cent. Blood sugar .125 per cent. Blood nitrogen 27 mmg. Blood chlorides 495 mmg. Blood Kahn test was negative. Electrocardiograph showed early coronary sclerosis but no notable myocardial changes.

The patient was prepared for an exploratory operation with intravenous glucose and saline.

Operation was performed two days later under ether anesthesia. A high right rectus incision was made; no free fluid was found in the abdominal cavity. The stomach, gall bladder, spleen, pancreas, duodenum and colon were normal. The liver showed moderate hepatitis, but there was no evidence of metastases. A large mass the size of a grapefruit was then exposed, and found to involve the jejunum about 12 inches from the ligament of Treitz. The mass was freely movable, and there were a few enlarged mesenteric glands. The jejunum proximal and distal to the growth showed considerable edema, so it was deemed advisable to resect the growth, including the mesenteric glands, and to close both ends of the bowel and perform a lateral anastomosis. These procedures were carried out. An enterostomy was then performed distal to the anastomosis, and the wound was closed in the usual manner.

A continuous drip cannula was inserted into the vein of the arm, and the patient was given 500 c.c. of blood during the operation, the cannula being left intact for venoclysis. A prophylactic dose of tetanus-gas gangrene serum was given.

Pathological examination.—Gross description: Specimen measured 23 x 20 x 18 cms. The specimen had been cut in the long axis of the bowel; both proximal and distal portions of the bowel were normal. Between the normal bowel there was an irregular, firm, cauliflower-like mass which practically obliterated the lumen. On the cut surface the tumor mass presented an opaque, white, firm nodular mass of tissue in which are scattered several small, yellowish-white nodules with some degenerative changes in the center. In several areas there are collections of a hemorrhagic exuduate which covers the margins near the normal bowel. There are several small glands in the attached mesentery. Microscopic diagnosis: Advanced adenocarcinoma—not metastatic in the lymph nodes.

Postoperative treatment consisted of continuous venoclysis of 10 per cent glucose in saline at the rate of forty drops per minute for five days. The cannula was then removed and 1,000 c.c. of solution was given intravenously daily for seven days. A Levine tube was inserted and attached to a suction apparatus and it was clamped part time on the fifth day and was removed on the eighth day. An indwelling catheter was inserted into the bladder and removed on the thirteenth day. Glucose and saline solution was instilled into the enterostomy tube every two hours, the tube coming out spontaneously on the eighth day. Fluids were given on the second day and a high caloric soft diet on the eighth day, with the addition of ferric ammonium citrate 45 grains daily. Two hundred c.c. of blood were given the fourth, and 150 c.c. on the fifth day after the operation. The wound healed well, and the patient was up in a chair on the fourteenth day and discharged from the hospital on the seventeenth postoperative day. The patient gained 20 pounds of weight in two months. His blood count February, 1937, was, hemoglobin 85 per cent, erythrocytes 4,780,000. Roentgenological examination February fifteenth showed the barium meal to pass through the jejunum at a normal rate. He resumed his occupation, regained his lost weight, and has been in perfect health since.

Summary

1. Two interesting cases of primary carcinoma of the jejunum are reported.

2. Both cases presented a different group of symptoms and differed in many details.

3. Both cases made uneventful recoveries after operation, and are in good health twenty-eight and eighteen months, respectively, after operation.

Bibliography

1. Ackman, F. D.: Carcinoma of the small intestine. Canadian Med. Assn. Jour., 32:634-639, 1935.
2. Barnhart, S. E.: Carcinoma of the jejunum. Jour. A.M.A. 101:443-444, 1933.
3. Bartlett, M. D.: Carcinoma of the jejunum. New Eng. Jour. Med., 207:34, 1932.
4. Gabor, M. E., and Hiller, R. I.: Primary carcinoma of the jejunum. Amer. Jour. Surg., 27:121-125, 1935.
5. Harris, D. J., and Harrison, C. V.: Primary carcinoma of the small intestine. British Med. Jour., 1:923-924, 1935.
6. Harris, F. I., and Rosenblum, H.: Primary carcinoma of the jejunum. Arch. Surg., 23:805-812, 1931.
7. Kalayjian, B.: Carcinoma of the jejunum. Radiology, 29:596-601, 1937.
8. Kiefer, E. D., and Lahey, F. H.: Tumors of the small intestine. New Eng. Jour. Med., 208:1042-1048, 1933.
9. Kordenat, R. A.: Carcinoma of the jejunum. Ill. Med. Jour., 65:218-221, 1934.
10. Mayo, C. W., and Nettrour, W. S.: Carcinoma of the jejunum. Surg., Gyn. and Obst., 65:303-309, 1937.
11. Mitchell, E. W.: Carcinoma of the jejunum. Canadian Med. Assn. Jour., 31:395-397, 1934.
12. Newton, F. C., and Buckley, R. C.: Primary adenocarcinoma of the proximal jejunum. New Eng. Jour. Med., 202:255-261, 1930.
13. Pow, D. L.: Intestinal obstruction caused by ring carcinoma of the small intestine. British Med. Jour., 1:925, 1935.
14. Proescher, F., and Muir, J.: Primary carcinoma of the jejunum. Am. Jour. Cancer, 24:72-74, 1935.
15. Stein, J. J.: Tumors of the small intestine. Am. Jour. Digest. Dis. and Nutrition, 4:517-522, 1937.

THE USE OF DRIED BILE AS A THERAPEUTIC AGENT*

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The rôle of bile in digestion is an important one. When bile is drained continuously for a long period the subject becomes thin and emaciated, even though fluids and inorganic salts are given in ample quantities. That this is due to lack of normal bile in the intestinal tract sufficient to carry out normal digestive processes is suggested by the fact that a similar picture is seen in cases of long standing obstruction of the common bile duct. For a considerable number of years bile obtained from choledochostomy drainage has been fed back into the patient by mouth. A beneficial effect was noted although it was appreciated that the bile draining from a recently decompressed liver often was deficient in quality.

Because of this recognized deficiency, C. G. Johnston, while associated with I. S. Ravdin of the University of Pennsylvania in 1935, replaced the bile lost from patients through drainage by substituting liquid animal bile.[5] Considerable difficulty and inconvenience was encountered in the collection and preservation of the bile. In addition, liquid bile is most distasteful, although this can be overcome by feeding the bile through a stomach tube. The usual dried bile preparations available were found to be inadequate.

In an attempt to prepare bile in dried form from which the original sample of bile could be reproduced by the addition of water, the method of drying described by Flosdorf and Mudd[3] for the lyophilization of serum was used. By this procedure it is possible to remove from beef, pig or human bile most of the water, and a dry yellow powder results. When water is added to this material it readily forms a solution not unlike the bile from which it is prepared. The method used by Flosdorf and Mudd was not suitable for quantity production and the resulting preparation was sticky and not easily handled. Through the courtesy of Parke, Davis and Company we have since had prepared a much more suitable product by the process of vacuum distillation routinely used for drying biological and other materials. The process consists of drying bile in high vacuum, the vacuum distillation cooling the system sufficiently so that the use of dry ice as used by Flosdorf and Mudd is found unnecessary. Pig bile so prepared results in a dry, fluffy, golden material which readily dissolves to form liquid bile physically resembling the original specimen. Approximately 9 c.c. of pig gallbladder bile is necessary to prepare one gram of dried substance.

The symptoms associated with lack of bile in the gastro-intestinal tract are lack of strength, anorexia, distention, constipation and malaise. The gastric and intestinal motility and tone are decreased, the stools become clay colored and greasy and loss of weight is quite common. In those cases where there is complete absence of bile from the gastro-intestinal tract these symptoms are usually quite constant and clear-cut. Many individuals who have no frank evidence of lack of bile in the intestinal tract suffer from a similar train of symptoms, less severe and less definite but closely akin, which the laity calls "biliousness." Unquestionably, many such attacks have nothing to do with biliary diseases, and in this group of cases it is often difficult to determine definite etiological factors. Such episodes are frequently associated with flatulence, loss of appetite, slight distention and constipation.

Carlson and Still[11] demonstrated that, associated with the absence of bile from the intestinal tract, hunger contractions are decreased, as is gastric motility. This forms a basis for the explanation of the anorexia associated with the absence of bile in the intestinal tract and possibly also for the constipation and distention. We have found that even in normal animals the ingestion of the dried bile preparation increases the gastric tone and the amplitude and rate of gastric contractions.

It is probably not necessary for the bile in the intestinal tract to be decreased in amount to produce symptoms; a qualitative

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deficiency might result in a similar train of symptoms. Following release of obstruction of the common duct, bile is known to be deficient in at least one constituent, namely bile salts.[1,8,9] It is quite likely that associated with varying degrees of hepatic insufficiency, variations in the composition of the bile occur.

The use of whole bile in cases where bile is totally or partially excluded from the intestinal tract, as in the case of drainage of the common duct, is now a well established procedure and is based on sound and fundamental considerations. Dried bile properly prepared has proven satisfactory as a substitute for whole bile and has been used for the past few years on the service of Dr. I. S. Ravdin at the Hospital of the University of Pennsylvania and on the service of Dr. Charles G. Johnston at Receiving Hospital in Detroit. In this report we shall limit our discussion to the use of dried bile in cases where there is no loss of bile through drainage, but in which there are symptoms which might be attributable to the deficiency in the quantity or quality of bile in the intestinal tract. The chief symptom for which the dried bile has been given is loss of appetite. It is not to be expected that dried bile will relieve this symptom in all cases. Increase in motility of the stomach need not in itself affect anorexia; in fact, it is quite possible that in some cases one might expect an aggravation of this symptom. In our experience this has been true, especially where it was tried on a purely empirical basis.

Our best results have been obtained in those cases where there has been definite evidence of biliary disease. Where bile feeding has proven efficacious the increase in appetite has been evident usually within a few hours. In an occasional instance, however, anorexia has been increased even though the underlying factor has been a definite biliary disorder. We are presenting a few typical case reports to illustrate the effects of bile therapy.

Case 1.—A white woman, twenty-five years of age, had a cholecystectomy performed in February, 1937, at which time a gallbladder filled with stones was removed. She had had numerous attacks of jaundice, fever, and upper right quadrant pain. From February, 1937, until admission to the hospital, March 21, 1938, she complained of daily chills and fever, severe right upper quadrant pain, nausea and vomiting. Physical examination revealed a slender, young white woman definitely jaundiced. Her temperature was 105 degrees. There was marked spasm of the right upper rectus muscle and tenderness in the right upper hypochondrium. The patient was given transfusions and intravenous glucose solutions. She was put on a high carbohydrate diet but was unable to eat satisfactorily because of marked anorexia. She was given two capsules of pig bile (0.35 gm. each) three times a day with meals. Her anorexia ceased after the first bile feeding and her appetite remained excellent during her preoperative period.

Case 2.—A white girl, ten years of age, was admitted to the hospital complaining of abdominal pain, anorexia, nausea, vomiting, jaundice, and chilly sensations. She also was constipated. The above symptoms had been present for one week. Physical examination revealed a rather thin, jaundiced girl whose essential physical findings were in the abdomen, consisting of mild right sided subcostal tenderness. Her temperature was 99.3 degrees, the urine negative, and complete blood count normal. A diagnosis of acute catarrhal jaundice was made. Transfusions and intravenous glucose solutions were given. Two capsules of pig bile (0.35 gm. each) were given three times daily. The anorexia immediately subsided and the patient began to eat normally. Within three weeks she gained eight pounds in weight.

Case 3.—A white man, sixty-five years of age, had been suffering with anorexia, weakness, loss of weight and enlargement of abdomen with recurrent jaundice for the past five years. Two years ago, he was completely studied at a large Chicago clinic, at which time a diagnosis of cirrhosis of liver was made. Since that time he has had marked anorexia, gaseous distention, belching and constipation. Dry pig bile (1 gram 4 times a day) was administered and after one day the above symptoms disappeared. He stated that this was the first time in five years that he really had enjoyed his meals. This relief of symptoms continued.

Table I lists the results obtained in twenty-seven cases. These constitute our best results, and in the majority definite improvement followed the bile feeding. We also have used this preparation in a large number of cases in which there was, as far as we could determine, no relationship between the symptoms and the production and excretion of bile, but in which there was anorexia. The majority of these latter cases either showed no beneficial effects from bile feeding or only slight improvement, and in some instances the anorexia was actually increased.

Comment

For many years bile preparations have been used to alleviate symptoms occurring in gastro-intestinal disorders. Most of the bile preparations have not been effective and none of these preparations with which we are familiar are capable of dissolving to form bile. As may be seen by the foregoing report, in suitable cases feeding of dried bile has been effective in the relief of anorexia. Also the associated symptoms of

TABLE I. RESULTS OBTAINED IN TWENTY-SEVEN CASES

Color Sex	Age	Diagnosis	Jaundice	Anorexia	Distention Belching	Consti-pation	Dosage	Results
W F	G.C. 10	Acute Catarrh-al jaundice	++	Marked	Moderate	Moderate	Caps ii	Immediate relief. Seen in follow-up one month later. Symptoms gone and gaining weight.
C F	I.C. 36	Carcinoma of cecum	–	Marked	Marked	Moderate	Caps ii t.i.d.	Appetite definitely im-proved and began to gain wt. preop. Right colon resected.
W F	G.K. 34	Adhesions gallbladder area	–	Marked	Marked	Moderate	Caps ii t.i.d.	Appetite improved aft-ter giving of bile.
W F	P.K. 30	Chronic Calcu-lus. Cholecys-titis. Lues	–	P.O. Marked	–	–	Caps ii q.i.d.	Had cholecystectomy and given caps q.i.d. with marked improve-ment. Stopped for 3 days, appetite decreased so started again
W F	P.H. 52	Portal and bil-iary cirrhosis. Secondary anemia	++	Marked	Marked	Moderate	Caps ii t.i.d.	Patient in poor condi-tion. Appetite im-proved for 24 hrs., but patient went steadily downhill and died.
C M	G.E. 21	Acute catarrh-al jaundice	++	Marked	Moderate	Moderate	Caps ii q.i.d.	Appetite responded rapidly but general con-dition was improving at same time.
C M	J.R. 76	Carcinoma of head of pan-creas. Carci-nomatosis	+	Marked	Moderate	Moderate	Caps ii t.i.d.	Patient had downhill course. Refused opera-tion. Bile caps relieved anorexia but patient ex-pired.
W M	G.S. 54	Carcinoma of head of pan-creas. Duoden-al diverticulum	++	Marked	Marked	Moderate	Caps iii q.i.d.	Appetite improved slightly.
C M	B.C. 31	Pneumonia	–	Mild	Mild	Mild	Caps iii t.i.d.	Appetite improved.
W M	C.B. 43	Acute yellow atrophy, tox-ic hepatitis.	++	Mild	Marked	Moderate	Caps ii q.i.d.	Improved appetite temporarily but patient developed acute yellow atrophy and died.
W F	M.A. 26	Obstructive jaundice	++	Marked	Mild	Marked	Caps ii t.i.d.	Immediate relief of an-orexia.
W F	P.H. 30	P.O. Chole-cystectomy	–	Occa-sional	Mild	–	Caps t.i.d.	No relief after taking caps t.i.d. for 1 month.
W M	G.L. 46	Catarrhal jaundice. Gastric ulcer	++	Marked	Marked	Moderate	Caps ii t.i.d.	Appetite immediately improved. Continued 1 month and smyptoms gone.
W F	W.N. 38	Interstitial hepatitis.	Sub-icteric	Marked	Mild	Mild	Caps ii t.i.d.	Showed slight improve-ment. Reduction in gas and increase in appetite after 2 wks. feeding of bile. Improvement in general condidtion.

TABLE I. RESULTS OBTAINED IN TWENTY-SEVEN CASES—*Continued*

Color Sex	Age	Diagnosis	Jaundice	Anorexia	Distention Belching	Constipation	Dosage	Results
W F	S. 60	Obstruction common duct	++	Marked	Marked	Moderate	Caps ii t.i.d.	Marked improvement in appetite. Reduction of gas.
W M	J.S. 60	Acute cholecystitis.	+	Mild	Mild	Mild	Caps ii t.i.d.	Showed slight improvement when symptoms subsided. (Bile in urine decreased and icteric index down.)
W F	S.K. 42	Postoperative cholecystostomy.	+ subsiding	Mild	Moderate	Moderate	Caps ii t.i.d.	Definite improvement in appetite
W F	A.W. 65	"Gallbladder trouble" for years. Dyspepsia.	–	Unable to eat fats	Marked	Moderate	Caps ii q.i.d.	After 1 week, gas improved and patient felt better. More appetite. Stopped bile.
W M	M.S. 29	Unable to gain weight	–	"Poor appetite"	–	–	Caps ii q.i.d.	Appetite improved rapidly. Laxative effect. Gained 3 lbs. in one week.
W M	S 65	Cirrhosis of liver	Subclinical	Marked	Marked	Moderate	Caps ii q.i.d.	Immediate relief of all symptoms and increase in appetite.
W M	C.W. 36	Common duct obstruction	++	Marked	Marked	Marked	Caps iii q.i.d.	Appetite improved. Gas and constipation relieved.
W F	W.S. 40	Acute gallbladder. Common duct obstruction and hepatitis	+	Marked	Marked	Moderate	Caps ii q.i.d.	Appetite improved in 1 day and other symptoms subsided.
W M	R.A. 31	Catarrhal jaundice. Postinfectious	++	Marked	Marked	Marked	Caps ii q.i.d.	Patient was desperately ill. An improvement in appetite occurred faster than would be expected in so sick a patient even though convalesence was progressing favorably.
W M	H.A. 65	Diabetes Hepatitis	+	Moderate	Moderate	Mild	Caps iii t.i.d.	Patient received bile feeding for 2 wks. and showed no improvement.
B M	B.C. 31	Cirrhosis of liver	subclinical	Moderate	Mild	None	Caps iii t.i.d.	Results indeterminate Appetite varied. Bile feedings discontinued after four days.
B F	L.G. 31	Common duct obstruction	++	Marked	Moderate	Mild	Caps ii q.i.d.	Bile feedings for 1 wk. No improvement. Stopped as nausea increased.
W M	W.R. 54	Cholecystectomy 8 yrs. ago. ? Acute pancreatitis	+	Marked	Moderate	Moderate	Caps ii q.i.d.	After 4 days of bile feeding patient showed slight improvement only.

belching, distention and constipation have been materially affected in the majority of cases. It has also been noted that dried bile has a slightly laxative effect. Since the preparation of dried bile which we use is soluble, it is suitable for use in a variety of conditions. The recent work by Greaves and Schmidt,[4] Osterberg, Butt and Snell,[2] and Quick,[7] who noted the effect of vitamin K on the reduction of prothrombin time in jaundiced patients, emphasized the importance of the use of bile in connection with this vitamin. The use of the dried bile forms a simple means of supplying additional bile so necessary for the absorption of vitamin K.

We wish to emphasize that the dosages which we have used have been purely empirical. One gram of dried bile is the equivalent of approximately nine grams of gallbladder bile. Since this is real hunger bile and hence quite concentrated, one gram is equal to at least 90 c.c. of liver bile using the figures of Rous and McMaster[10] regarding the concentrating activity of the gallbladder. It is estimated that the average output of bile from the liver is approximately 300 c.c. to 500 c.c. Therefore, it may be seen that if four grams of dried bile are given, sufficient bile will be replaced into the system.

In conclusion, it may be stated that the dried bile preparation described has proven useful in correcting anorexia and other symptoms associated with biliary disorders. It also makes available a satisfactory preparation which can be used whenever additional bile is indicated.

We are deeply indebted to Dr. Richard McKean and the Department of Internal Medicine at the Detroit Receiving Hospital for their assistance and the use of some of their clinical material.

Bibliography

1. Breusch, F., and Johnston, C. G.: Zum Verschwinden und Wiedererscheinen der Gallensauren in der Galle bei Vorubergehendem Choledochusverschluss. Klin. Wchnschr., 13:1856-57, 1934.
2. Butt, H. R., Snell, A. M., and Osterberg, A. E.: Use of vitamin K and bile in treatment of hemorrhagic diathesis in cases of jaundice. Proc. Staff Meet. Mayo Clinic, 13:74-79, (Feb.) 1938.
3. Flosdorf, E. W., and Mudd, S.: Procedure and apparatus for preservation in "lyophile" form of serum and other biological substances. Jour. Immunol., 29: 389-425. (Nov.) 1935.
4. Greaves, J. D., and Schmidt, C. L. A.: Nature of the factor concerned in loss of blood coagulability of fistula rats. Proc. Soc. Exper. Biol. and Med., 37:43, (Oct.) 1937.
5. Johnston, C. G.: Preoperative and postoperative treatment in cases of obstructive jaundice. Surgery, 3:875-83, (June) 1938.
6. Osterberg, A. E.: Vitamin K: Its distribution and clinical properties: Methods of preparation and assay. Proc. Staff Meet. Mayo Clinic, 13:72-74, (Feb.) 1938.
7. Quick, A. J.: The nature of the bleeding in jaundice. Jour. A. M. A., 110:1659-62, (May) 1938.
8. Ravdin, I. S., Johnston, C. G., Riegel, C., and Wright, S. L.: A study of human liver bile after release of common duct obstruction. Jour. Clin. Invest., 12:659-72, (July) 1933.
9. Riegel, Cecilia, Johnston, C. G., and Ravdin, I. S.: Studies on gallbladder function VIII. The fate of bile pigment and cholesterol in hepatic bile subjected to gallbladder activity. Jour. Exper. Med., 56:1-11, (July) 1932.
10. Rous, P., and McMaster, P. D.: Concentrating activity of gallbladder. Jour. Exper. Med., 34:47, July, 1921.
11. Still, K. S., and Carlson, A. J.: The motor and secretory activity of the stomach during acute and chronic obstructive jaundice in dogs. Am. Jour. Physiol., 89:34-45, (June) 1929.

CONVULSIONS OCCURRING DURING NITROUS OXIDE-OXYGEN ANESTHESIA*

With Report of a Case

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The administration of a general anesthetic, be it either nitrous oxide-oxygen, ether, or a combination of both, must always be of serious concern to the surgeon because of the fact that one never knows in advance the precise manner in which the patient will react to the anesthetic. Although today nitrous oxide-oxygen anesthesia is considered to be a safe procedure, yet of late there have appeared in the medical literature reports of cases having developed convulsions during nitrous oxide-oxygen anesthesia with fatal terminations, either immediately or at a later period following an interval of unconsciousness. Convulsions caused by nitrous oxide-oxygen may develop any time during the period of anesthesia, or even several hours after the administration of the anesthetic. In practically all cases reported the patient who appeared to be doing well under the anesthetic, suddenly and without warning developed difficulty in respiration,

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with or without cyanosis, and soon manifested tremors, twitchings, rigidity and generalized convulsions as a terminal event.

Mrs. C. S., aged thirty-one, had, as her chief complaint, pain in the left lower abdominal quadrant two and one-half years duration. Examination revealed a relaxed perineum and several external hemorrhoids. On bimanual examination, the uterus was retroverted and there was tenderness of the left adnexa. A tentative diagnosis of laceration of the perineum, external hemorrhoids, retroversion of the uterus and chronic left salpingitis was made and the patient was sent in to the Highland Park General Hospital for operation. Her general condition was good. The heart and lungs were normal. Blood pressure, 110/65. The urine was normal. Hemoglobin, 85 per cent. Red blood count—4,660,000. White blood count—11,800. F. 62. N. F. 13. Endo. 2. Lymph. 23. Kahn was negative. There appeared to be no contra-indication for operation. The next morning the patient received by hypodermic injection, morphine sulphate gr ¼ and atropin sulphate gr. 1/150. Nitrous oxide-oxygen anesthesia with a small amount of ether was administered. The induction of the anesthetic was smooth. The patient's color was good. Breathing was normal and the patient tolerated the anesthesia well with the exception of a rapid pulse of 120 which continued throughout the period of anesthesia. Perineorrhaphy and hemorrhoidectomy was performed first. The abdomen was then opened by mid-line incision. The uterus was found to be retroverted. Large varicosities were present in the left broad ligament. The left tube appeared to be chronically inflamed. A left salpingectomy with the removal of the varicosities of the left broad ligament was then performed. The right round ligament was shortened and a routine appendectomy was performed. After the peritoneum was sutured and just as we were closing the fascia, the patient suddenly developed jerky breathing. This was immediately followed by twitching about the mouth and upward rolling of the eyes. The upper extremities developed epileptiform movements. This spread to the lower extremities and finally the muscles of the abdomen manifested twitchings. This convulsion lasted about three minutes. Oxygen and carbon dioxide was administered at once. I was unable to sew up the fascia, and was obliged to suspend the closure temporarily. As soon as the convulsion ceased, I was able to effect the closure without additional anesthesia. The patient's blood pressure dropped from 110/65 to 70/35. The pulse continued to be 120. Respiration—24. Temperature—99°. The patient was returned to bed in fair condition. She was watched carefully during the post-operative period. At 1:00 p. m. of the day of the operation she reacted from the anesthetic and with the exception of headache of which she complained during the post-operative period, she made an uneventful recovery, and left the hospital fourteen days after operation.

Clinical Discussion

At first we were at a loss as to the cause of this convulsion. After some discussion, however, three differential diagnostic possibilities were considered.

1. *Epilepsy.*—Even under anesthesia an epileptic person may manifest a convulsive seizure. This condition could, however, be ruled out in this instance, inasmuch as the patient did not give a history of previous seizures.

2. *Embolism.*—Because we were doing surgery on large varicosities in the pelvis it was thought possible that emboli might have lodged in the brain. However, the uneventful convalescence of the patient would likewise rule out embolism as a cause of convulsion in this case.

3. *Nitrous oxide-oxygen anesthesia* appeared then as the possible cause.

It is apropo, at this time, to review the pharmaco-dynamics of nitrous oxide-oxygen anesthesia.

A. Nitrous oxide has a specific narcotic action on nerve cells.

B. Asphyxia is produced and with it anoxemia. Cyanosis may or may not be present. Asphyxia and cyanosis are not always synonymous.

C. Nitrous oxide has a depressant action on inhibitory and respiratory centers and a depressant action on motor cells.

What, then, are the possible causes of convulsions under nitrous oxide-oxygen anesthesia? We will here attempt to enumerate all such causes as described in the literature on this subject.

Idiosyncrasies and constitutional habitus are mentioned prominently by many. In those cases where a patient develops convulsions within a few seconds or minutes after inhalation of nitrous oxide-oxygen, idiosyncrasy and constitution plays an important rôle.

Toxicity of Drug

Wilson,[14] foremost anesthetist of England, states that all anesthetics are toxic agents in varying degree, and, therefore, it is not surprising that nitrous oxide possesses some toxicity.

The impurities of nitrous oxide comprise the hydrazines, hydroxylamines and inert nitrogen which may accumulate in the tank. These impurities tend to inhibit normal oxidation in nerve cells and the resulting disturbance of brain tissue respiration may produce convulsions. By tissue respiration we mean the interchange of oxygen and carbon dioxide between the cellular elements and tissue fluid.

The reflex theory implies that pressure on the carotid sinus may send impulses through the vagus to the respiratory center and thus cause difficulty in respiration. Pressure at the angle of the jaw which so many anesthetists resort to should be discontinued

in order to prevent the possible occurrence of this phenomenon.

The United States Public Health workers[8] studied brains of dogs who have been exposed to atmospheres deficient in oxygen. The resulting anoxemia produced severe hyperemia of the brain. Meningeal and cerebral vessels were dilated and there were many petechial hemorrhages. There was severe damage in the neurons of the brain cortex and degenerative changes in the basal ganglia. Tashiro has shown that nervous tissue uses more oxygen and forms more carbon dioxide in proportion than any other body tissue. There is also a difference in the susceptibility of the nerve cells to oxygen deprivation. The cells of the cortex and basal ganglia are the most sensitive; muscular tissue rank second in the utilization of oxygen and formation of carbon dioxide. It is because of this fact that we are able to produce anesthesia and yet maintain life. If nervous and muscular tissue consumed oxygen at the same rate, by the time the patient was unconscious he would be dead, as the muscles including the heart muscle would have ceased to function. This difference between the two tissues in oxygen consumption is the margin of anesthesia.

Neuropathological changes in brain cortex. In 1916, Baldwin[1] was the first to report fourteen fatalities caused by nitrous oxide-oxygen anesthesia. He pointed out the dangers associated with this type of anesthetic. Since then several American surgeons and one European have reported convulsions and deaths attributable to nitrous oxide anesthesia. Caine[4] was the first to mention damage of the brain as an etiological factor of convulsions and death. However, no histological descriptions of the neuro-pathology was advanced by any of them. It remained for Lowenberg[9] and Waggoner of the University of Michigan to be the first to study the histology of three human brains, obtained at autopsy from patients who died of nitrous oxide-oxygen anesthesia. Lowenberg described, in great detail, the gross and microscopic pathological changes in these brains. Most of the neuropathology appeared in the cortex of the brain. There was a dissociation of the normal brain architecture, and fragmentation of the pyramidal cell which involved, mostly, the second, third, fifth and sixth layers of the cortex. There were some perivascular hemorrhages present. Degenerative changes were also discernible in the basal ganglia. In the cerebellum the Purkinje cells manifested destruction. In May, 1936, Courville,[6] in a very complete, detailed and comprehensive paper, published the results of his extensive studies of thirteen cases who died as a result of nitrous oxide-oxygen anesthesia. In the main he corroborated the findings of Lowenberg and in addition described multiple areas of necrosis in the brain cortex. Pinson[12] claims that the convulsions in his cases were caused by an excess of carbon dioxide in the system. This may very well take place during the administration of nitrous oxide anesthesia by the rebreathing of CO_2 through the bag. Other causes mentioned in the literature are atropin overdosage, histamine bodies liberated by trauma of tissues during the operation and hypoglycemia due to depleted glycogen reserve.

Out of fairness to nitrous oxide anesthesia, it is only proper that we should mention the fact that convulsions also occur under ether anesthesia. Ether has been in general use for ninety years and yet it is singularly peculiar that no mention has been made in the medical literature of the occurrence of convulsions prior to 1925. The original series of ether convulsions occurred at St. Bartholomew's Hospital, in August of 1925. Nine cases were reported with four fatalities. Since then several papers have been published, both here and abroad, notably by Mennell,[11] Pinson,[12] MacKenzie,[10] Clements,[5] Sears,[13] and others. Careful investigations have been carried out to determine the etiological factors responsible for this distressing and dangerous complication. The following deductions can be made from the analysis of cases and from review of the literature on the subject.

It appears that some persons possess an idiosyncrasy (vague as the word may be) to ether and manifest it by developing convulsions. Accessory factors are necessary for the development of convulsions, such as heat, sepsis, or toxemia, youth and impurities of ether; a good grade of ether should be free from impurities, however, under certain conditions, the best of ether can develop impurities after the containers have been opened. For example, when ether is heated or when nitrous oxide gas and oxygen are bubbled through it, ether impurities, consisting of acetaldehyde and peroxide may develop. These by-products tend to inhibit normal oxidation in nerve

cells and the resulting anoxemia of the brain produces the convulsions.

Sepsis or toxemia appears to be a decided contributory factor because many of the convulsions reported occurred in patients with suppurative appendicitis and peritonitis or in patients who were toxic from other causes. MacKenzie[10] explained this phase by assuming that the increased circulation caused by ether carries more toxins to the brain, which causes cerebral irritation. That ether *per se* produces irritation of the brain is of common knowledge, as we observe in the excitement stage of anesthesia, the addition of toxins augments this irritability and may explain the occurrence of convulsions in septic cases.

Another factor which is worth consideration is youth, as a great majority of convulsions were reported in children whose nervous system is quite unstable. However, we have had ether administered for one hour to a four-day-old baby for the repair of a hare lip without the appearance of convulsions. Because this distressing and serious condition occurs abruptly in an inopportune time and because one-third to one-half of cases have a fatal termination, it is essential for the anesthetist, the surgeon and assistants to familiarize themselves with the etiology, symptomatology and treatment of this emergency in order to be able, intelligently, to combat it when it occurs.

Treatment

From the prophylactic standpoint in the absence of a method whereby one could predict the occurrence of convulsions, it seems desirable to exercise extreme caution in the selection of an anesthetic for each individual. Patients should come to operation in a resigned mental attitude, and no anesthetic should be forced on any patient. I feel, also, that single anesthetics are safer than mixed. Just as in pharmacology we have discontinued the use of shot-gun prescriptions and substituted single drugs whose physiologic action is definitelv known, so in anesthesia, it is probably best to employ a single anesthetic at a time, which will simplify the metabolic changes produced in the body and give us better control of the situation, although, in some instances a combined anesthesia is desirable and of decided benefit. Before administering a general anesthetic to a septic or toxic child, it is well to consider also other types of anesthesia.

Now, as to the curative treatment. This would vary in each case. Whenever possible the anesthetic should be discontinued as soon as convulsions commence and operative manipulations suspended. Anti-spasmodics should be administered at once. If the patient is cyanotic, oxygen and carbon-dioxide should be given. Chloroform, sometimes, has proven beneficial. In one person, dextrose, intravenously, has been given with spectacular results. Calcium gluconate has been used because of its action in reducing hyper-irritability of the neuro-muscular system. In extreme emergency adrenalin can be used to advantage. Last, but not least, it has been suggested by King[8] that intravenous hypnotics, because of immediate absorption, would prove of value.

Bibliography

1. Baldwin, J. F.: Med. Rec., 90:177-1916.
2. Ball, J. M.: Ether tragedies. Amer. Med. History, 7:264-266, (Sept.) 1935. (Ill.)
3. Bowman, F. H.: Convulsions under deep anesthesia. Amer. J. Surg., N. S., 23:295, (Feb.) 1934.
4. Caine, A. M.: Amer. Jour. Surg., April Supplement, p. 34, 1923.
5. Clement, F. W.: Convulsions during anesthesia. Anes. and Analg., 7:72, (March-April) 1928.
6. Courville, Cyril B.: Asphyxia as a consequence of nitrous oxide-anesthesia. Medicine, 15: No. 2, (May) 1936.
7. Hadfield, C. F.: Discussion on late ether convulsions. Roc. Roy. Soc. Med., 21:1699, (Aug.) 1928.
8. King, H. J.: Convulsions under ether anesthesia. Am. Jour. Surg., N. S., 30:182, (Oct.) 1935.
9. Lowenberg, K., Waggoner, W. R., Zbinden, Th.: Destruction of the cerebral cortex due to nitrous oxide-oxygen anesthesia. Ann. Surg., 104: No. 5, (Nov.) 1936.
10. MacKenzie, J. R.: Convulsions during surgical anesthesia. Brit. Med. Jour., 1:440, (March 14) 1931.
11. Mennell, Z.: Proc. Royal Soc. of Medicine, 21: No. 10, 1705, (1927-1928).
12. Pinson, K. B.: Convulsions occurring during surgical anesthesia. Brit. Med. Jour., 1:56, (May) 1927.
13. Sears, J. B.: Later ether convulsions. Jour. A. M. A., 100:1150, (April 15) 1933.
14. Wilson, S. R.: Carbon dioxide in anesthesia. Brit. Jour. Anes., 3:112-118, (Jan.) 1926.
15. Yant, W. P.; Chorynak, John; Schrenk, H. H.; Payyt, F. A., and Sayers, R. R.: Studies in asphxyia. U. S. Public Health Bulletin, No. 211, p. 39, 1934.



Downtown Detroit Waterfront

THE CONVENTION CITY

IT IS difficult to find a virgin field of description for physicians and their families who attend the annual meeting of the Michigan State Medical Society, this month, so familiar is everyone with the Metropolitan City of the state. Detroit welcomes you, and your hosts of the Wayne County Medical Society look forward to the pleasure of entertaining you. In spite of the depression which all are feeling to a greater or less degree, medical Detroit will cast aside any pessimism it may feel and the glad hand to its out-of-town guests will be truly genuine.

To the women guests, Detroit's stores will be found as attractive as ever, and who of them does not enjoy an afternoon's shopping? Not only this as a diversion, the Art Center is within easy reach by automobile or bus.

Detroit has become one of the important education centers of the country. Wayne University, perhaps the largest municipal educational institution of its kind, has grown great with its affiliated medical, law and teachers' colleges. And here the medical reader will be interested in the movement in the Wayne University Medical School which has succeeded the Detroit College of Medicine and Surgery. The older institution emphasized the practical or clinical features of medicine. The Wayne Medical School has undertaken extensive research in the various sciences basic to medicine and surgery. It is a class A school, meeting all the requirements of the Council on Medical Education of the American Medical Association. The buildings on St. Antoine and Mullett Streets, which house the school, will be familiar to the graduates of the old Detroit College of Medicine and Surgery, but many new faces of full time professors and instructors will be found. The trend towards research is in keeping with the spirit of the



Greenfield Village

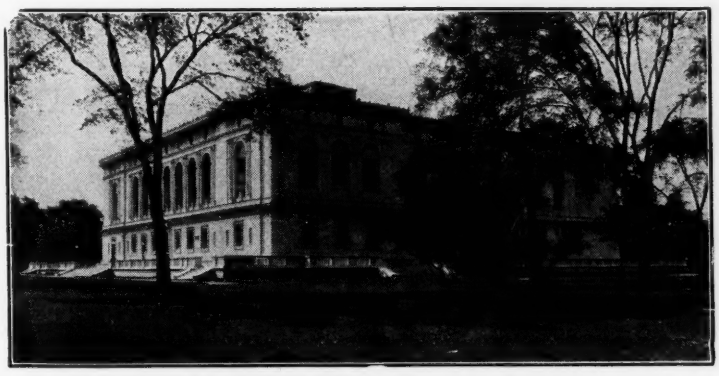
age in Detroit. The rich and varied clinical material which such a large city provides is being used for teaching purposes. Clinics by Wayne County members of the medical profession constitute a postgraduate course throughout the entire year.

Detroit as a manufacturing and industrial center is too well known to require more than mention here.

Of the attractions, Greenfield Village and the Detroit Zoological Gardens are among the most interesting objects in America. Greenfield Village at Dearborn is a historical museum of Americana becoming more important and valuable with the march of time. The Zoological Gardens out Woodward Avenue show the various animals in a native habitat as nearly as possible. The Gardens have an area of 125 acres served by a miniature narrow gage railway which relieves the spectator of much walking.



NIGHT SCENE, WASHINGTON BOULEVARD, DETROIT



THE PUBLIC LIBRARY, DETROIT

For the visiting members at the convention, there is ample opportunity and facilities for golf. In setting forth here a short account of Detroit's interesting pastime facilities, the program of the medical convention is presented in this number of THE JOURNAL in sufficient detail to speak eloquently for itself.

On page 812 of this number of THE JOURNAL will be found the program of the Woman's Auxiliary. Beginning with Monday, September 19, and continuing through Thursday, September 22, almost every hour will afford something interesting to the members of the Auxiliary and their guests. Mrs. A. O. Brown, general chairman of the committee of the Woman's Auxiliary, and her committee have been active weeks in advance in the preparation of what will prove to be one of the best programs placed before the Woman's Auxiliary of the Michigan State Medical Society. With the passing of the years, there has been greater and greater need for the Woman's Auxiliary. The educational work the society has attempted cannot be performed by any other group so well as by the doctors' wives. We have in mind particularly the dissemination of popularized medical knowledge as contained each month in *Hygeia,* as well as lectures to lay audiences which are sponsored by county and state branches of the society.

Michigan State Medical Society

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1881—*J. H. Jerome, Saginaw
1882—*Geo. W. Topping, DeWitt
1883—*A. F. Whelan, Hillsdale
1884—*Donald Maclean, Detroit
1885—*E. P. Christian, Wyandotte
1886—*Charles Shepard, Grand Rapids
1887—*T. A. McGraw, Detroit
1888—*S. S. French, Battle Creek
1889—*G. E. Frothingham, Detroit
1890—*L. W. Bliss, Saginaw
1891—*George E. Ranney, Lansing
1892—*Charles J. Lundy (died before taking office)
*Geo. V. Chamberlain, Flint, Acting President
1893—*Eugene Boise, Grand Rapids
1894—*Henry O. Walker, Detroit
1895—*Victor C. Vaughan, Ann Arbor
1896—*Hugh McColl, Lapeer
1897—*Joseph B. Griswold, Grand Rapids
1898—*Ernest L. Shurly, Detroit
1899—*A. W. Alvord, Battle Creek
1900—*P. D. Patterson, Charlotte
1901—*Leartus Connor, Detroit
1902—*A. E. Bulson, Jackson
1903—*Wm. F. Breakey, Ann Arbor
1904—*B. D. Harison, Sault Ste. Marie
1905—*David Inglis, Detroit
1906—*Charles B. Stockwell, Port Huron
1907—*Herman Ostrander, Kalamazoo
1908—*A. F. Lawbaugh, Calumet
1909—*J. H. Carstens, Detroit
1910—*C. B. Burr, Flint
1911—*D. Emmett Welsh, Grand Rapids
1912—*Wm. H. Sawyer, Hillsdale
1913—*Guy L. Kiefer, Detroit
1914— Reuben Peterson, Ann Arbor
1915—*A. W. Hornbogen, Marquette
1916— Andrew P. Biddle, Detroit
1917— Andrew P. Biddle, Detroit
1918— Arthur M. Hume, Owosso
1919— Charles H. Baker, Bay City
1920— Angus McLean, Detroit
1921—*Wm. J. Kay, Lapeer
1922—*W. T. Dodge, Big Rapids
1923— Guy L. Connor, Detroit
1924—*C. C. Clancy, Port Huron
1925—*Cyrenus G. Darling, Ann Arbor
1926— J. B. Jackson, Kalamazoo
1927— Herbert E. Randall, Flint
1928— Louis J. Hirschman, Detroit
1929— J. D. Brook, Grandville
1930—*Ray C. Stone, Battle Creek
1931—*Carl F. Moll, Flint
1932— J. Milton Robb, Detroit
1933— George LeFevre, Muskegon
1934— R. R. Smith, Grand Rapids
1935— Grover C. Penberthy, Detroit
1936— Henry E. Perry, Newberry

*Deceased.

The 1938 Meeting



HENRY COOK, M.D.
Flint
President



P. R. URMSTON, M.D.
Bay City
Council Chairman



P. A. RILEY, M.D.
Jackson
Speaker, House of Delegates

OFFICIAL CALL

THE Michigan State Medical Society will convene in Annual Session in Detroit on September 19, 20, 21, 22, 1938. The provisions of the Constitution and By-laws and the official Program will govern the deliberations.

Henry Cook, M.D.
President

P. R. Urmston, M.D.
Chairman of The Council

Philip A. Riley, M.D.
Speaker

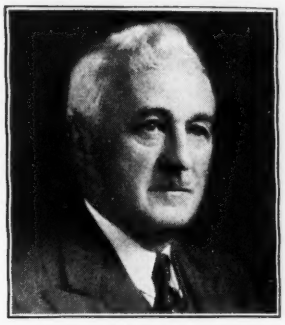
Attest: L. Fernald Foster, M.D., Secretary



L. FERNALD FOSTER, M.D.
Bay City
Secretary



WM. A. HYLAND, M.D.
Grand Rapids
Treasurer



H. A. LUCE, M.D.
Detroit
President-Elect

CONVENTION INFORMATION

DIRECTORY

Headquarters.....Book-Cadillac Hotel, Detroit

Registration and General Assemblies.....
Fourth Floor, Book-Cadillac Hotel

Press Room .....
Parlor F. Fifth Floor, Book-Cadillac Hotel

Secretary's Office .....Book-Cadillac Hotel

Technical Exhibits .....
Fourth Floor, Book-Cadillac Hotel

Woman's Auxiliary Headquarters.....
Statler Hotel, Detroit

* * *

Register—Fourth Floor Book-Cadillac Hotel, Detroit—as soon as you arrive.

Admission by badge only to all General Assemblies and Section Meetings. Monitors at entrance. Bring your A.M.A. or county medical society membership card to expedite registration.

Hours of Registration: Daily 8:30 a. m. to 6:00 p. m. on Monday, Tuesday, Wednesday, and to 4:00 p. m. on Thursday.

No registration fee to members of the Michigan State Medical Society.

* * *

Seven General Assemblies, Tuesday, Wednesday, Thursday, September 20, 21, 22.

Public Meetings: The Evening Assemblies of Tuesday and Wednesday, September 20 and 21, will be open to the public.

All Section Meetings will be held on Wednesday morning only, September 21.

SYMPOSIUM ON "THE BUSINESS SIDE OF MEDICINE"

Monday, September 19, 1938—3:30 to 5:00 P. M.

English Room (Mezzanine), Book-Cadillac Hotel, Detroit

Arranged for secretaries and office assistants of M.S.M.S. members. Physicians and their wives are cordially welcome.

Program

Presiding: B. I. Johnstone, M.D., Detroit.

1. "Office Secretary's Psychology with Patients and Visitors" (10 min.)—Henry C. Black, Battle Creek, Michigan.
2. "Importance of Simple and Accurate Records" (10 min.)—Miriam Zion, New York, N. Y.
3. "Collection Procedures" (10 min.)—Frank E. Parker, Detroit, Michigan.

Round Table Discussion

CONFERENCE FOR INTERNES AND RESIDENTS

Monday, September 19, 1938—2:30 to 3:30 P. M.

English Room (Mezzanine), Book-Cadillac Hotel, Detroit

All Internes and Residents in Michigan hospitals are cordially invited to be guests of the Michigan State Medical Society at this conference.

Program

Presiding: H. R. Carstens, M.D., Detroit.



R. G. LELAND, M.D.

1. "The Value of Medical Organization to the Physician and to the Public," (10 min.) R. G. LELAND, M.D., Chicago, Ill., Director, Bureau Medical Economics, A.M.A.
2. "The Place of the Michigan State Medical Society in the Young Physician's Life," (10 min.).... L. FERNALD FOSTER, M.D., Bay City, Secretary, Michigan State Medical Society.
3. "Pitfalls of the Practice of Medicine—Practical Pointers," (20 min.)..... J. M. ROBB, M.D., Detroit, Past-President, Michigan State Medical Society.

Round Table Discussion

This Conference will be followed immediately by the symposium on "The Business Side of Medicine." Conferees are urged to remain for this valuable session.

Physicians, not members, if listed in the American Medical Directory, may register as guests upon payment of $5.00. (This amount will be credited to them as dues in the Michigan State Medical Society *for the balance of 1938 only,* provided they subsequently are accepted as members by their County Medical Society.)

* * *

Technical Exhibits open Tuesday, September 20, at 8:30 A. M., and on Wednesday and Thursday at the same hour. Exhibits close Tuesday and Wednesday at 6:00 P. M.; Thursday at 3:30 P. M. Intermissions to view the exhibits have been arranged during the morning and afternoon General Assemblies.

ATTENTION GOLFERS!

The golf tournament scheduled for the Tam O'Shanter Club on Sunday, September 18, has been cancelled due to the special and important meeting of M.S.M.S. delegates on that date.

COUNTY SECRETARIES' CONFERENCE

English Room **Book-Cadillac Hotel**

TUESDAY, SEPTEMBER 20, 1938

5:30 to 8:00 P. M.

John J. McCann, M.D., Ionia, Presiding



"The Physician and the Public."

Wm. S. Sadler, M.D.

Dr. Sadler is a practitioner of more than thirty years experience, formerly professor at the Postgraduate Medical School of Chicago, Director and Chief Psychiatrist of the Chicago Institute of Research and Diagnosis, Consulting Psychiatrist Columbus Hospital, Consultant in Psychiatry, the W. K. Kellogg Foundation.

Wm. S. Sadler, M.D.

He is the author of numerous psychiatric works, including "Theory and Practice of Psychiatry," "Psychiatric Nursing," "The Mind at Mischief," etc.

The Doctor is a Fellow of the American Medical Association, the American Psychiatric Association, and a member of the American Psychopathological Association.

By both his writings and his lectures the doctor has been a consistent advocate of broad and rational principles of psychiatry, and was among those writers who early placed emphasis upon the importance of the preventive aspects of mental hygiene.

REFRESHMENTS DINNER

All Members of the State Society Will Be Welcome at This Conference.

Essayists are very respectfully requested not to change time of lecture with another speaker, without the approval of the General Assembly. This request is made in order to avoid confusion and disappointment on the part of the audience.

PROGRAM SYNOPSIS

SUNDAY, SEPTEMBER 18

1:00 P. M. **Third Annual Golf Tournament.**
Tam O'-Shanter Country Club

6:30 P. M. **Meeting of The Council, M.S.M.S.**
Founders Suite, Book-Cadillac Hotel.

7:00 P. M. **Golfers Banquet. Presentation of Prizes.**
Tam O'-Shanter Country Club

MONDAY, SEPTEMBER 19

8:00 A. M. **Delegates' Breakfast.**
English Room, Book-Cadillac Hotel.

9:00 A. M. **First Session, House of Delegates.**
Grand Ballroom, Book-Cadillac Hotel.

2:30 P. M. **Conference for Residents and Internes.**
English Room, Book-Cadillac Hotel.

3:00 P. M. **Second Session, House of Delegates.**
Grand Ballroom, Book-Cadillac Hotel.

3:30 P. M. **Symposium on "Business Side of Medicine."**
English Room, Book-Cadillac Hotel.

8:00 P. M. **Third Session, House of Delegates.**
Grand Ballroom, Book-Cadillac Hotel.

TUESDAY, SEPTEMBER 20

8:30 A. M. **Registration; Exhibits Open.**
Fourth Floor, Book-Cadillac Hotel.

9:30 A. M. **First General Assembly.**
Grand Ballroom, Book-Cadillac Hotel
(For detailed program, see page 816.)

12:30 P. M. **Committee Organization Luncheon.**
Chairmen of 1938-39 Committees.
Parlor H, Book-Cadillac Hotel.

1:30 P. M. **Second General Assembly.**
Grand Ballroom, Book-Cadillac Hotel.
(For detailed program, see page 817.)

5:30 P. M. **County Secretaries Conference.**
English Room, B-C Hotel.

8:00 P. M. **Third General Assembly.**
Grand Ballroom, B-C Hotel.
PUBLIC MEETING. (For detailed program, see page 818.)

WEDNESDAY, SEPTEMBER 21

8:30 A. M. **Registration; Exhibits Open.**
Fourth Floor, Book-Cadillac Hotel.

9:30 A. M. **Meetings of Sections:**

General Medicine
English Room, B-C Hotel (see page 814.)

Surgery
Grand Ballroom, B-C Hotel (see page 814.)

Gynecology and Obstetrics
Washington Room, B-C Hotel (see page 814.)

Ophthalmology
Founders Suite, B-C Hotel (see page 814.)

Otolaryngology
Parlors G, H, I, B-C Hotel (see page 814.)

Pediatrics
Parlor '06-'07, Book-Cadillac Hotel (see page 816.)

Dermatology & Syphilology
Harper Hospital (see page 816.)

12:30 P. M. **Preventive Medicine Committee Reunion Luncheon.**
English Room, B-C Hotel.

12:30 P. M. **Maternal Health Committee's Luncheon.**
Washington Room, B-C Hotel.

1:30 P. M. **Fourth General Assembly.**
Grand Ballroom, B-C Hotel.
(For detailed information see page 819.)

8:00 P. M. **Fifth General Assembly.**
Grand Ballroom, B-C Hotel.
PUBLIC MEETING. (For detailed information see page 820.)

THURSDAY, SEPTEMBER 22

8:30 A. M. **Registration; Exhibits Open.**
Fourth Floor, Book-Cadillac Hotel.

9:30 A. M. **Sixth General Assembly.**
Grand Ballroom, B-C Hotel.
(For detailed information, see page 820.)

1:30 P. M. **Seventh General Assembly.**
Grand Ballroom, B-C Hotel.
(For detailed information, see page 821.)

5:00 P. M. **End of Convention.**

Woman's Auxiliary



MRS. G. C. HICKS, Presiding

OFFICERS, 1937-38

Mrs. G. C. Hicks, Jackson.....President
Mrs. P. R. Urmston, Bay City.....President-Elect
Mrs. L. G. Christian, Lansing.....Vice President
Mrs. J. W. Page, Jackson.....Secretary-Treasurer
Mrs. A. V. Wenger, Grand Rapids...Past President
Mrs. Guy L. Kiefer, East Lansing.....
Honorary President

PROGRAM

MONDAY, SEPTEMBER 19, 1938

3:00 to 4:30 P.M. Office Secretaries' Conference

English Room, Book-Cadillac Hotel, Detroit

Symposium on the "Business Side of Medicine." Secretaries, doctors' wives and other interested individuals invited.

Three ten-minute talks and round-table discussion.

TUESDAY, SEPTEMBER 20, 1938

10:00 A.M. Registration—Statler Hotel, Detroit

1:00 P.M. Luncheon, Pre-Convention Board Meeting

Statler Hotel, Detroit

1937-38 Board Members and County Presidents

6:00 P.M. Banquet—Statler Hotel, Detroit

Presiding Officer—Mrs. G. C. Hicks

Chairman—Mrs. A. O. Brown
Short Talk—Morris Fishbein, M.D., Chicago, Advisory Council, A.A.M.A.

Honor Guests—Mrs. Chas. Tomlinson, National President, A.A.M.A.; Mrs. Guy L. Kiefer, Honorary President, A.M.S.M.S.; and Mrs. Morris Fishbein

Speaker—Mrs. Lawrence Hess
Subject: "Social Hygiene"

8:30 P.M. Bridge—Statler Hotel

MRS. A. O. BROWN

General Chairman of Committee of the Woman's Auxiliary for the 73rd Annual Convention of the Michigan State Medical Society, Detroit, Michigan.



WEDNESDAY, SEPTEMBER 21

10:00 A.M. Business Session, Statler Hotel, Detroit

All doctors' wives of the state are urged to attend

Presentation of pins, Mrs. Chas. Tomlinson, Omaha, Neb., National President, A.A.M.A.

1:00 P.M. Luncheon—Colony Club

Guests—Mrs. Chas. Tomlinson
National President, A.A.M.A.

—Henry Cook, M.D., Flint, Retiring President, M.S.M.S.

—H. A. Luce, M.D., Detroit, President, M.S.M.S.

—President-elect, M.S.M.S.
(Name to be announced)

—L. Fernald Foster, M.D., Bay City, Secretary, M.S.M.S.

—H. R. Carstens, M.D., Detroit, President, Wayne County Medical Society

Speaker—H. S. Collisi, M.D., Grand Rapids, Chairman, Advisory Committee, W.A.M.S.M.S.

Subject: "Marriage After Forty"

4:00 P.M. Post-convention Board Meeting

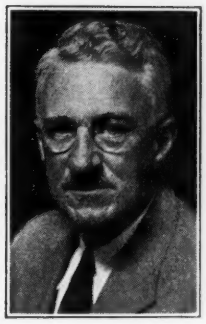
Mrs. P. R. Urmston presiding
1938-39 Board Members

THURSDAY, SEPTEMBER 22, 1938

10:30 A.M. Fashion Show



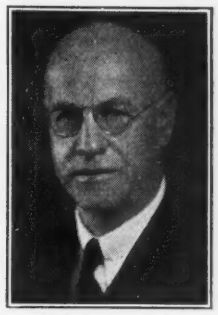
FRANK H. LAHEY, M.D.



H. O. JONES, M.D.



J. E. MOORE, M.D.



H. A. CHRISTIAN, M.D.



A. D. RUEDEMANN, M.D.

Guest Speakers



JOHN E. GORDON, M.D.

☆



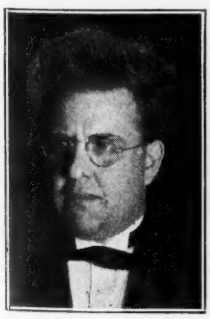
F. J. TAUSSIG, M.D.

Detroit
1938

(Additional photographs on Page 815)



S. J. SEEGER, M.D.



O. V. BATSON, M.D.



J. A. BARGEN, M.D.



M. FISHBEIN, M.D.



WM. D. MCNALLY, M.D.



C. A. ALDRICH, M.D.

PROGRAM of SECTIONS

WEDNESDAY MORNING

September 21, 1938

SECTION ON GENERAL MEDICINE

English Room, Mezzanine Floor, Book-Cadillac Hotel

Chairman: Wm. L. Bettison, M.D., Grand Rapids
Secretary: Douglas Donald, M.D., Detroit

A. M.

9:30 Massive Collapse of the Lung
David I. Sugar, M.D., Detroit

10:00 A New Interpretation of Diabetes Mellitus in Obese Middle-Aged Patients. Recovery by Reduction of Weight
Jerome W. Conn, M.D., Ann Arbor

10:30-11:00 Election of Officers

11:00 Sulfanilamide
Gordon Myers, M.D., Detroit

11:30 Fever of Undetermined Origin
Donald S. Smith, M.D., Pontiac

12:00 Bromide Intoxication
Raymond W. Waggoner, M.D., Ann Arbor

SECTION ON SURGERY

Grand Ballroom, Fourth Floor Book-Cadillac Hotel

Chairman: Wm. R. Torgerson, M.D., Grand Rapids
Secretary: M. D. Wertenberger, M.D., Jackson

A. M.

9:00 to 9:30 A Combined Operation for Cancer of the Rectum
Fred W. Rankin, M.D., Lexington, Ky.

9:30 to 10:00 The Treatment of Burns
Stanley J. Seeger, M.D., Milwaukee

10:00 to 10:30 Limitations of Transurethral Prostatectomy
Reed M. Nesbit, M.D., Ann Arbor

10:30 to 11:00 Hemorrhoidectomy Under Regional Anesthesia (illustrated by slides and colored moving pictures)
Louis J. Hirschman, M.D., Detroit

11:00 to 11:30 Knee Joint Injuries Exclusive of Fracture (with lantern slides)
Kellogg Speed, M.D., Chicago

11:30 to 12:00 Election of Officers

P. M.

12:00 to 12:30 The Problems of Severe Hyperthyroidism
Walter G. Maddock, M.D., Ann Arbor

SECTION ON GYNECOLOGY AND OBSTETRICS

Washington Room, Fifth Floor Book-Cadillac Hotel

Chairman: Norman R. Kretzschmar, M.D., Ann Arbor
Secretary: Clarence Toshach, M.D., Saginaw

A. M.

9:00 to 9:30 Radiation Therapy in Benign Pelvic Lesions
Norman R. Kretzschmar, M.D., Ann Arbor

9:30 to 10:00 Cesarean Section in Detroit
Ward F. Seeley, M.D., Detroit

10:00 to 11:00 Lymph Gland Removal in Cervix Cancer; Technics and Results
Fred Taussig, M.D., St. Louis

11:00 to 11:30 Maternal Health Survey in Michigan
Alexander M. Campbell, M.D., Grand Rapids

11:30 to 12:30 Prolapse of the Uterus
Joseph Baer, M.D., Chicago

Election of Officers

SECTION ON OPHTHALMOLOGY AND OTOLARYNGOLOGY

Chairman: Dewey R. Heetderks, M.D., Grand Rapids
Secretary: O. B. McGillicuddy, M.D., Lansing

OPHTHALMOLOGY

Founders' Suite, Fifth Floor Book-Cadillac Hotel

A. M.

9:30 to 10:45 Ophthalmological Round Table, to be conducted by
A. D. Ruedemann, M.D., Cleveland

Subject: "Endocrine Disturbances Pertaining to the Eye"

Same subject to be repeated 11:00 A. M. to 12:15 P. M. in order that all section members may hear both papers. Members of this section are invited to change to Parlor G-H-I at 10:45 A. M. to hear Doctor Batson.

OTOLARYNGOLOGY

Parlors G-H-I, Fifth Floor Book-Cadillac Hotel

A. M.

9:30 to 10:45 Otolaryngological Round Table, to be conducted by
O. V. Batson, M.D., Philadelphia

Subject: "The Surgical Anatomy of the Ear"

Same subject to be repeated 11:00 A. M. to 12:15 P. M. in order that all section members may hear both papers. Members of this section are invited to change to the Founders' Suite at 10:45 A. M. to hear Doctor Ruedemann.

P. M.

12:30 Luncheon for Members of the Section on Ophthalmology and Otolaryngology. Founders' Suite, Book-Cadillac Hotel.

Election of Officers

It is important that those planning to attend the luncheon notify the Secretary at once as all places will be reserved.



F. G. EBAUGH, M.D.



F. E. ADAIR, M.D.



J. L. BAER, M.D.



H. F. HELMHOLZ, M.D.



R. L. HADEN, M.D.

Guest Speakers



KELLOGG SPEED, M.D.

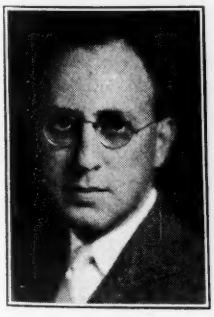


KATHARINE LENROOT

Detroit
1938



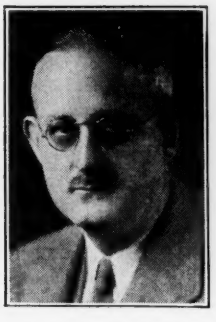
R. D. MUSSEY, M.D.



R. GRINKER, M.D.



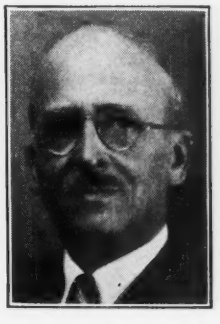
F. D. RANKIN, M.D.



H. CASPARIS, M.D.



A. F. VOSHELL, M.D.



HOWARD FOX, M.D.

SECTION ON PEDIATRICS

Parlor '06-07 (See Bulletin Board, Fourth floor) Book-Cadillac Hotel

Chairman: ALLAN L. RICHARDSON, M.D., Detroit
Secretary: WARD L. CHADWICK, M.D., Grand Rapids

A. M.

9:00 to 9:30 A Ten Year Study of Nine Hundred Reactors to Tuberculin with Particular Reference to Their Experience at Puberty
JOSEPH A. JOHNSTON, M.D., Detroit

9:30 to 9:45 Four Years' Experience with Whooping Cough Immunization
WARD L. CHADWICK, M.D., Grand Rapids

9:45 to 10:00 Experiences with Over Four Hundred Whooping Cough Immunizations
EDGAR E. MARTMER, M.D., Detroit

10:00 to 10:15 Experiences in the Treatment of One Hundred Cases of Erysipelas with Sulfanilamide
FRANKLIN H. TOP, M.D., Detroit

10:15 to 11:00 The Flat Foot Problem in Childhood (with clinical cases)
FREDERICK J. FISCHER, M.D., Detroit

11:00 to 11:15 Tetany in the New Born
JOHN L. LAW, M.D., Ann Arbor

11:15 to 12:00 The Management of Critical Situations in Childhood Nephritis
C. A. ALDRICH, M.D., Winnetka, Ill.

Election of Officers

SECTION ON DERMATOLOGY AND SYPHILOLOGY

Harper Hospital, Detroit

Chairman: GEO. VAN RHEE, M.D., Detroit
Secretary: RUTH HERRICK, M.D., Grand Rapids

A. M.

9:00 to 10:15 Clinic at Harper Hospital, 3839 Brush Street, Detroit

10:15 to 10:45 Discussion of cases presented

10:45 to 11:00 Chairman's Address
GEORGE VAN RHEE, M.D., Detroit

11:00 to 11:20 Mouth Lesions
ARTHUR WOODBURNE, M.D., Grand Rapids

11:20 to 11:40 Skin Disturbance in Nervous Patients
MILTON G. BUTLER, M.D., Saginaw

11:40 to 12:00 Treatment of Urticaria and Allied Dermatoses
CLAUD W. BEHN, M.D., Detroit

P. M.

12:00 to 12:20 Discussion

12:20 to 12:30 Election of officers

PROGRAM of GENERAL ASSEMBLIES

TUESDAY MORNING
September 20, 1938

First General Assembly

Grand Ballroom, Fourth Floor, Book-Cadillac Hotel

HENRY R. CARSTENS, M.D., Presiding
L. FERNALD FOSTER, M.D., and DOUGLAS DONALD, M.D., Secretaries

A. M.

9:30 "The Management of Surgical Conditions of the Common Bile Duct"

FRANK H. LAHEY, M.D., Boston, Mass.

Harvard Medical College, 1904; Professor of Surgery, Tufts Medical School, 1913-17; Director of Surgery, A.E.F. Evacuation Hospital No. 30; Major, Medical Corps, World War; Professor of Clinical Surgery, Harvard Medical School, 1923-24. At present, Director of Lahey Clinic, Boston; Surgeon-in-Chief, New England Deaconess Hospital; Surgeon-in-Chief, New England Baptist Hospital; President, American Association for the Study of Goiter; member, American Surgical Society, International Surgical Society.

In three thousand operations for gallstones, the following deductions have been made. The mortality of gallstones is largely related to prolonged infection and stones within the bile ducts. These are the *result of late operations for gallstones.* The fatality factors in operations for gallstones exclusive of acute cholecystitis, are jaundice, hemorrhage, liver infection and diminished liver function.

Operations for gallstones, to insure the most complete relief, postoperatively, should consist in removal of the gall bladder and in addition, removal of all stones from the common and hepatic ducts, together with prolonged drainage of the biliary tree when infection is present. Indications for opening and investigating the common and hepatic ducts will be stated and this plan insures the least morbidity and the lowest mortality.

10:00 "Tubal Pregnancy"

HAROLD O. JONES, M.D., Chicago, Ill.

Professor of Gynecology, Northwestern University Medical School; Senior Gynecologist and Chairman of the Department of Obstetrics and Gynecology, St. Luke's Hospital.

A series of lantern slides are used to develop the idea of explaining the events in tubal pregnancy, based upon the progressive pathology. The fact that implantation is the same wherever it may take place is used to demonstrate the serious accidents that occur in tubal pregnancies.

A series of photomicrographs are used to outline the trochoblastic activity of the chorion, and also the lack of defense in the tissues not especially prepared for the reception of the fertilized ovum.

A third group of slides gives in detail the statistical data concerning the occurrence of the important symptoms.

TUESDAY MORNING
September 20, 1938

10:30 INTERMISSION TO VIEW THE EXHIBITS

11:00 "Syphilitic Primary Optic Atrophy"

JOSEPH E. MOORE, M.D., Baltimore, Md.

M.D., Johns Hopkins, 1916; First Lieutenant and Captain, Medical Corps, A.E.F., 1917-19; successively Assistant, Instructor and Associate in Medicine, Johns Hopkins University, 1919 to present; Physician-in-Charge, Syphilitic Division, Medical Clinic, 1930 to present; Assisting Visiting Physician, Johns Hopkins Hospital; Member, American Society for Clinical Investigation, Association of American Physicians, American Clinical and Climatological Society; Special Consultant, U. S. Public Health Service; Consultant in Venereal Diseases, Maryland State Health Department.

Syphilitic eye condition, if untreated, always results in blindness in both eyes. With routine treatment the blindness of a few patients is delayed, but with special forms of treatment, well known to doctors in this field, the patient may be totally protected from this complication of syphilis.

11:30 "Certain Cardiorenal Circulatory Correlations"

HENRY ASBURY CHRISTIAN, M.D., Boston, Mass.

Johns Hopkins, 1900; Sc.D., Jefferson, 1928; LL.D., Randolph-Macon, 1923, and from Western Reserve, 1931; F.R.C.P. (Hon.), Canada, 1936; Instructor in Pathology, Harvard, 1902-05; in charge of medical students, Massachusetts General Hospital, 1905-07; Hersey Professor, Theory and Practice of Physics, Harvard, since 1908; Dean, Faculty of Medicine and Medical School, Harvard, 1908-12; Fellow Am. Acad., 1913; Corr. member, Wiener Gesellschaft f. innere Medizin, etc., 1923; Corr. member, Medico-Chirurgical Soc., Edinburgh, 1937; former Major, M.R.C., U. S. Army; Resident Chairman, Div. of Med. Sciences, Nat. Research Council, Washington, D. C., 1919-20; Physician-in-Chief, Peter Bent Brigham Hospital, Boston, since 1910.

In all the forms of kidney lesions, as here described, the cardiocirculatory correlations play a dominant part in causing their symptoms and physical signs. Part of the proper treatment of Bright's disease, especially the chronic forms, must concern itself with the therapeutic management of the circulation; this may be, and often is, the part of the treatment that yields the best results. The physician ever should keep in mind three facts: (1) that the general circulation disturbs renal function; (2) that disturbed renal function, the result of intrarenal lesions, has an injurious effect on general circulation; (3) that there is a close correlation between extrarenal and intrarenal circulation, each in an important way influencing the other, the two together productive of the physical signs and symptoms which we encounter in our patients whose urine shows departures from normal in specific gravity, albumin content and appearance in the sediment of casts and cells. Very simple methods of history taking, physical examination and urine study, all of which can be carried out by any well trained physician in his office, suffice for an adequate understanding of the clinical problems and for a proper therapeutic management of patients with chronic Bright's disease.

12:00 "Headaches and Head Pains of Ocular Origin"

A. D. RUEDEMANN, M.D., Cleveland, Ohio

M.D., University of Michigan, 1921; Head of Eye Department, Cleveland Clinic, since 1924; Secretary, Teachers' Section, American Academy of Ophthalmology and Otolaryngology; Secretary of Instruction in Ophthalmology American Academy of Ophthalmology and Otolaryngology;

The eyes play a very important part in the production of headaches and head pains. Proper examination of the eyes rather than fitting of glasses is necessary in order to differentiate the different types of pain that are primarily due to muscular pathology from that pain or headache that is secondary to eyestrain.

From the medical viewpoint in the case of every patient who presents himself with a headache, the eyes should be examined, for in some instances very minor eye changes cause terrific headaches although in other instances high refractive errors produce no headaches at all. Better and more complete examination of the eyes by the practitioner is indicated in most cases of headaches but a great many causes of headache can be ruled out by a few simple maneuvers. The eyes frequently afford the clue to the solution of the problem presented by the patient and it is wise to make use of the experience gained from the examination of the various eyes as they are presented for differential diagnosis. Although the patient may wear glasses, it does not follow that all abnormal conditions in the eyes have been corrected. Muscle instability and intraocular pathology cause a considerable amount of headache. The entire subject of headache as related to the eyes is one of importance and interest and affords an excellent field for treatment. The patients usually obtain a great deal of relief from very ordinary procedures.

P. M.

12:30 End of First General Assembly Luncheon—

VIEW THE EXTRAORDINARY EXHIBIT

TUESDAY AFTERNOON
September 20, 1938

Second General Assembly

Grand Ballroom, Fourth Floor, Book-Cadillac Hotel

VERNOR M. MOORE, M.D., Presiding
L. FERNALD FOSTER, M.D., and MORRIS D. WERTENBERGER, M.D., Secretaries

P. M.

1:30 "Babies Are Human Beings"

C. A. ALDRICH, M.D., Winnetka, Ill.

Associate Professor of Pediatrics, Northwestern University Medical School; Associate Physician and Chairman, Pediatric Department, Evanston Hospital; Associate Attending Physician, Children's Memorial Hospital.

The more we study human growth and development, the more we realize that babies are something very different from our traditional idea of them, and that somewhere along the line, we have failed to appreciate the peculiar value of their fundamental human qualities. It is only when we look at them against a developmental background that we begin to see them in proper perspective; as products of their evolutionary past, as dynamic living creatures and as potential adults.

In this presentation, an attempt will be made to interpret the behavior of newly born babies in the light of their purposeful nature, and to consider some of the individual differences at this age. Time will permit only the merest mention of how growth processes continually change these babies, as they grow into our complex society.

2:00 "Common Lesions of the Vulva"

FRED J. TAUSSIG, M.D., St. Louis, Mo.

Harvard, A.B., 1893; Washington University, M.D., 1898; President, Central Association of Gynecology and Obstetrics, 1929; President, American Gynecological Society, 1937; Gynecologist, Barnard Free Skin and Cancer Hospital, 1906-

TUESDAY AFTERNOON
September 20, 1938

1938; Professor of Clinical Obstetrics, Washington University School of Medicine.

The vulva is a part of the skin covering the body, but also a part of the genital tract, and influenced by the ovarian hormones. Hence we have a variety of skin lesions found elsewhere such as dermatitis, furunculosis, etc., and also certain specific genital changes such as leukoplakic vulvitis. In addition, the vulva is not uncommonly infected by venereal disease. Gonorrhea produces vulvo-vaginitis in children and Bartholin abscess or cyst after puberty. Syphilis produces characteristic primary sores, mucous patches, and gummata. Of special interest are the chronic hypertrophies associated with lymphogranuloma and granuloma inguinalis. In the field of neoplasms by far the most important is carcinoma, developing usually on a pre-existing leukoplakia. In spite of relative infrequency it is very important because with prompt diagnosis and proper treatment (complete vulvectomy and lymph gland removal) we can expect a five-year cure in two-thirds of the patients.

2:30 "The Treatment of Burns"

STANLEY J. SEEGER, M.D., Milwaukee, Wis.

M.D., Northwestern University, 1917; Chief of Columbia Hospital, Milwaukee Children's Hospital; Chairman, Council on Industrial Health, American Medical Association.

Burns constitute an important medical and surgical as well as economic problem. Since the introduction of tannic acid by Davidson, in 1925, there has been a great revival of interest in the various problems presented. The cause of so-called toxic burn shock is not clear. The relief of pain, blood transfusion, the replacement of lost fluids and chlorides, the application of external heat, in addition to proper local care of the wound, are important factors in a program of treatment.

Since more attention has been paid to the treatment of burns more patients are carried through the immediate acute stage and develop large granulating wounds. The derma, or true skin, is derived from the mesoderm and is, therefore, a tissue which is not designed to serve as a source of epithelial development. A well established principle in the treatment of large granulating wounds is that an attempt should be made to cover them with epithelium at the earliest possible moment. Delay in epithelization means an increase in scar tissue and greater deformity.

Large granulating wounds present difficult problems in the control of infection, the maintenance of nutrition and the general care of the individual.

3:00 INTERMISSION TO VIEW THE EXHIBITS

3:30 "Hearing and Deafness"

OSCAR V. BATSON, M.D., Philadelphia, Pa.

M.D., St. Louis University, 1920. Instructor in Anatomy, University of Wisconsin, 1920-21; Assistant Professor, Associate Professor and Professor of Anatomy, University of Cincinnati, 1921-28; Professor of Anatomy, Graduate School of Medicine, University of Pennsylvania since 1928; Instructor in Otolaryngology, School of Medicine, University of Pennsylvania, since 1936! Staffss Graduate Hospital, University Hospital and Philadelphia General Hospital; Member, American Association of Anatomists, The American Academy of Ophthalmology and Otolaryngology.

So much effort has been focused upon the obviously deafened that a slight degree of hearing deficiency might be assumed to be but a slight handicap. Many cases of small loss of hearing acuity as shown by testing methods have, for practical purposes of daily life, an almost total disability. Efforts should be made to decide upon the relative disability as well as the absolute hearing loss. The principal disabling factor in a "mixed deafness" should be determined if possible. If suited, hearing devices should be advised and the patient helped to adjust himself. The introduction of hearing aids into the schools can help pupils with a slight reduction in hearing acuity and they will help to break down the prejudice against hearing aids.

4:00 "The Management of the Various Types of Ulcerative Colitis"

J. ARNOLD BARGEN, M.D., Rochester, Minn.

Associate Professor of Medicine, Mayo Foundation; Consultant in Medicine, Mayo Clinic; in charge of Intestinal Service, St. Mary's Hospital; Member, American Gastro-Enterological Association, Central Society for Clinical Research, Pan-American Medical Association, International Gastro-Enterological Association, etc.

There are many different forms of colitis. Tuberculous colitis has been generally recognized since the turn of the century. During the second decade of this century, the pandemic, epidemic, and endemic possibilities of mebic colitis and amebiasis were discovered. During the third decade of this century, streptococic ulcerative colitis was described as an entity. Many other types of ulcerative colitis are now known. Among them, that kind in which some bodily deficiency plays a rôle should be mentioned. Also regional enteritis and many other forms of inflammatory ulcerative disease of the colon are recognized. Each of these and their management will be discussed briefly.

The term "colitis" should be applied to an intestinal condition only when demonstrable inflammation is at hand. Hence, the term "mucous colitis" is no longer tenable.

4:30 End of Second General Assembly

THE EXHIBITS WILL REMAIN OPEN UNTIL 6:00 P. M.

TUESDAY EVENING
September 20, 1938

Third General Assembly

Public Meeting

Grand Ballroom, Fourth Floor, Book-Cadillac Hotel

HENRY A. LUCE, M.D., Presiding
L. FERNALD FOSTER, M.D., and C. S. TOSHACH, M.D., Secretaries

POSTGRADUATE CONVOCATION

P. M.

8:00

1. **Music by Wayne County Medical Society Glee Club**
2. **Call to Order**
3. **(a) "The Challenge of Medical Service"**

   JAMES D. BRUCE, M.D., Ann Arbor, Mich.

   Vice President in Charge of University Relations, University of Michigan; Chairman, Committee on Postgraduate Medical Education, Michigan State Medical Society.

   (b) Presentation of Certificates of Associate Fellowship in Postgraduate Education, Michigan State Medical Society

8:30 4. **"Social Aspects of Medical Care"**

MORRIS FISHBEIN, M.D., Chicago, Ill.

Rush Medical College, 1912; Editor, the Journal, A.M.A.; Hygeia; Associate Clinical Professor of Medicine, University of Chicago; Lecturer, History of Medicine, University of Illinois School of Medicine; author of many significant contribu-

TUESDAY EVENING
September 20, 1938

tions to medical and lay literature; Member, Chicago Pathological Society, Institute of Medicine, American Association for the Advancement of Science.

Increasing entrance of government into medical practice. The national health program of the interdepartmental committee. Factors in development of present government plans. Political aspects of the problem of medical care. The future of medical practice in the United States.

10:00 End of Third General Assembly

WEDNESDAY AFTERNOON
September 21, 1938

Fourth General Assembly

Grand Ballroom, Fourth Floor, Book-Cadillac Hotel

DON. W. GUDAKUNST, M.D., Presiding
L. FERNALD FOSTER, M.D., and O. B. MCGILLICUDDY, M.D., Secretaries

PREVENTIVE MEDICINE

P. M.

1:30 "Carbon Monoxide Poisoning"

WM. D. MCNALLY, M.D., Chicago, Ill.

M.D., Rush Medical College, 1920; Instructor in Chemistry, U. of Ill., 1905-06; Assoc. Prof. Materia Medica and Toxicology, Rush Med. College since 1923; Chief Chemist and Toxicologist, Cook County Coroner, 1913-29; Attending Physician Presbyterian Hospital, St. Joseph's Hospital, Chicago; General practice of medicine since 1920, Chicago; Appointed Lt. Col. Chem. Warfare, Reserve Corps, U. S. A.; Member Am. Chem. Society; Author of chapters on gas poisons, detection of blood stains in Peterson, Haines and Websters' Toxicology and Legal Medicine; also author of textbook on Toxicology.

Carbon monoxide is a modern poison with an historical record dating back twenty-five centuries. Deaths from this poison, in the home and in industry, increased each year until natural gas and the extensive use of electricity were introduced. Natural gas does not contain carbon monoxide, but as a source of heat and illumination it is usually mixed with 2 to 3 per cent of carbon monoxide.

Deaths from the exhausts of automobiles are on the increase and in all probability many accidents upon the highways are due to the effects of this insidious gas, which is colorless, odorless and tasteless. The literature contains abundant references to coronary lesions due to carbon monoxide intoxication. Poisoning by this gas may be acute or chronic, the symptoms and pathology vary depending upon the amount of gas absorbed and the length of time of exposure. Diagnosis of carbon monoxide poisoning is often very easy, sometimes difficult and never positive unless a chemical examination of the blood is made. The symptoms may simulate many conditions other than that of poisoning by this gas, thus leading to errors in diagnosis. Poisoning in private garages in winter is absolutely preventable, if certain measures are applied to the exhaust gas whereby it is discharged into the open air.

2:00 "The Obligations of the Medical Profession in Relation to Mental Health"

FRANKLIN G. EBAUGH, M.D., Denver, Colo.

Johns Hopkins University, 1919. Director Colorado Psychopathic Hospital and Professor of Psychiatry, University of Colorado Medical School, since 1924; Director of Division of Psychiatric Education, National Committee for Mental Hygiene, since 1933; Member, American Board of Psychiatry and Neurology; Consultant at Large in Mental Hygiene in the U. S. Public Health Service.

One of the most constructive aspects of the Mental Hygiene movement in this country has been the impetus and critical guidance it has given to medical education. By means of more intensive and thorough psychiatric teaching in the medical curriculum, the students of today are better prepared to recognize, understand and help the great number of patients who suffer from some type of personality disorder.

Mental Hygiene should enable the physician to understand himself better; it should lead to a greater enrichment of life and to a sympathetic understanding of the problems of others.

Indirectly it should enable him to care for the many baffling problems which are called "functional" which may or may not be associated with physical illness. It should also help him to understand the social or cultural pattern of the sick person in relation to his family, friends and fellow workers.

2:30 "The Recognition, Diagnosis, and Treatment of Breast Cancer"

FRANK E. ADAIR, M.D., New York, N. Y.

M.D., Johns Hopkins, 1915; Chairman, Committee for Treatment of Malignant Diseases, American College of Surgeons; Director, American Society for Control of Cancer: Attending Surgeon and Attending Officer, Memorial Hospital, New York; Consultant Surgeon, National Cancer Institute, Washington, D. C.; Consultant in Cancer, U. S. Veterans Administration; Consultant Surgeon, Hospital for Women and Children, Caledonian Hospital, New York; St. Luke's Hospital, Newburgh, N. Y., St. Joseph's Hospital.

A recent study made in New York state revealed that in 1933 750 patients with cancer of the skin, breast, mouth, rectum and uterus were studied; and of this number, 25.6 per cent had cancer which had not yet left its original site. Four years later, 1937, a group of 900 such cases were again studied, and they showed that 33.6 per cent had their disease still localized, demonstrating that in the same group 8 per cent more patients came early than did four years previously.

With the exception of skin cancer, there is probably no site where there should be such improvement in cures as in the breast.

3:00 INTERMISSION TO VIEW THE EXHIBITS

3:30 "Progress in Maternal Welfare"

JOSEPH LOUIS BAER, M.D., Chicago, Ill.

Professor of Obstetrics and Gynecology, Rush Medical College; Senior Attending Gynecologist and Attending Obstetrician, Michael Reese Hospital; Fellow, American Board of Obstetrics and Gynecology; Institute of Medicine, Chicago; American Gynecological Society, Board of Directors, Infant Welfare Society, Chicago.

There has long been need for better obstetric care of American women. Contrary opinion based on alleged statistical fallacies, comparisons between urban and rural data, institutional versus home deliveries, distinctions in population types, merely evades the issue. Facts about our national maternal welfare problem. Death rate in the registration area generally known. Disability rate largely ignored, a situation similar to the publicized results of auto accidents.

Prenatal care has improved. Deaths from toxemia have decreased. Deaths from sepsis and hemorrhage remain about stationary. Ignorance, poverty and lack of facilities are main factors. Improvement depends upon coöperation between the involved groups: (1) medical schools, hospitals, general practitioners and specialists; (2) the nursing profession; (3) all public agencies, community, state and federal; (4) an enlightened public.

4:00 "Field Studies in Scarlet Fever"

JOHN E. GORDON, M.D., Boston, Mass.

M.D., Rush Med. College, 1926; Military Service, Red Cross Commission on meningococcus

WEDNESDAY AFTERNOON
September 21, 1938

meningitis; Commission of the Surgeon General, U. S. Army investigating influenza; Chief of Laboratories, Camp Gordon, Atlanta, Ga; Instructor in Bacteriology, U. of Chicago; Assoc. Prof. of Bact. U. of Western Ontario, Canada; Asst. Sup. of Municipal Contagious Disease Hospital, Chicago; Medical Director, Herman Kiefer Hospital, Detroit, 1927; Medical Epidemiologist, Detroit Dept. of Health, through 1934; Special instructor in Post-graduate Medicine, U. of Michigan; 1932, worked in Europe at Robert Koch Institute and Rudolf Virchow Krankenhaus, with particular interest in evaluation of European measures for isolation and quarantine; 1934, Field Director of the International Health Division Rockefeller Foundation—problems concerned with scarlet fever; Professor of Preventive Medicine and Epidemiology Harvard Medical School.

4:30 End of Fourth General Assembly.

SAVE AN ORDER FOR THE M.S.M.S. EXHIBITORS

WEDNESDAY EVENING
September 21, 1938

Fifth General Assembly

Public Meeting

Grand Ballroom, Fourth Floor, Book-Cadillac Hotel

HENRY COOK, M.D., Presiding
L. FERNALD FOSTER, M.D., and WARD L. CHADWICK, M.D., Secretaries

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PRESIDENT'S NIGHT

P. M.

8:00 **1. Call to order by the President**

2. Invocation—Rev. Horace H. Mallinson, Detroit

3. Address of Welcome—Henry R. Carstens, M.D., Detroit, President, Wayne County Medical Society
Response

4. Announcements and Reports of the House of Delegates

8:15 **5. President's Annual Address—Henry Cook, M.D., Flint**

6. Induction of Henry A. Luce, M.D., Detroit, into Office as President of the M.S.M.S.
Presentation of Past President's Keys to Henry E. Perry, M.D., Newberry, Mich., and to Henry Cook, M.D., Flint, Mich.
Responses

7. Resolutions and motions

8. Introduction of the President-Elect, and other new officers of the Michigan State Medical Society

8:45 **9. The Andrew P. Biddle Oration: "Public Health the Product of Individual Preventive Medicine"**

HAVEN EMERSON, M.D., New York, N. Y.

M.D., Columbia, 1899; Asst. in Medicine, Columbia, 1906-10; Commissioner of Health and President, Board of Health of the City of New York, 1915-17; Professor of Hygiene and Preventive Medicine, Cornell, 1919-20; Professor Public Health Administration and Director DeLamar Institute of Public Health, College of Physicians and Surgeons, Columbia, 1922-; Survey of health and sanitation for League of Nations, Athens, Greece, 1929; National Advisory Health Council, 1931. Member, Committee of Expert Statisticians of League of Nations. Author of contributions in the fields of vital statistics, epidemiology, public health administration, and reports of surveys in a number of cities in this country for the city governments and volunteer health agencies.

The objectives sought by society through the agencies of government by the application of preventive medicine, have in most instances been previously attained for individuals and families by the independent services of the private practitioner.

The structure of modern local public health services is built upon the broad base of universal coöperation of the family physician, upon whose interest in the prevention as well as treatment of disease among his patients the health officer can always rely.

The more independent and encouraged by public authority is the practitioner of private medicine to engage in the prevention of disease in the individual and the family, the higher will be the level of community health and the more efficiently can public services be applied to supplement and assist him.

Presentation of Biddle Oration Scroll to Doctor Emerson

10:00 End of Fifth General Assembly

THURSDAY MORNING
September 22, 1938

Sixth General Assembly

Grand Ballroom, Fourth Floor, Book-Cadillac Hotel

WILFRID HAUGHEY, M.D., Presiding
L. FERNALD FOSTER, M.D., and RUTH HERRICK, M.D., Secretaries

A. M.

9:30 **"The Application of Recent Advancements in Urinary Antisepsis to Private Practice"**

HENRY F. HELMHOLZ, M.D., Rochester, Minn.

M.D., Johns Hopkins, 1921; Graduate work at Universities of Berlin, Breslau and Vienna; Professor of Pediatrics, Graduate Medical School, U. of Minnesota; Head, Dept. of Pediatrics, Mayo Clinic; President, International Congress, of Pediatrics 1940; President American Academy of Pediatrics; Vice President, American Board of Pediatric Examiners; Past-president, American Pediatric Society.

Diagnosis:
A. Determination of presence of infection.
B. Determination of type of infection
(1) By smear; (2) By cultures.
C. Determination of kidney function.

THURSDAY MORNING
September 22, 1938

D. Determination of presence or absence of urinary stasis.

Treatment:

A. Indication for use of various urinary antiseptics according to:
   (1) Infecting organism
   (2) Renal function
   (3) Reaction of urine.
B. Dosage of antiseptic, and mode of administration.
C. Culture control of urine.

10:00 "Clinical Nutritional Deficiency Disease"

RUSSELL L. HADEN, M.D., Cleveland, Ohio

Johns Hopkins Medical School, 1915; Director of Laboratories, Henry Ford Hospital, Detroit, 1917-18 and 1919-21; Assistant Chief of Medical Service, Base Hospital, Camp Lee, Va., 1918-19; Professor of Experimental Medicine, University of Kansas, 1923-30; Head of Division of Medicine, Cleveland Clinic, since 1930; Member, Association of American Physicians, American Society of Clinical Investigation; American Association of Pathologists and Bacteriologists, American Clinical and Climatological Association, Central Society for Clinical Research.

The lack of specific nutritional elements often leads to definite symptoms and clinical syndromes. Definite diseases such as scurvy, beri-beri and pellegra may occur. It is much more common, however, to have typical and milder symptoms as a result of the nutritional deficiency which are usually unrecognized. Often the deficiency is multiple, making the picture more complicated.

The important nutritional elements will be reviewed, their clinical importance evaluated and the results of a deficiency described. Typical case histories will be cited. The treatment will be emphasized.

10:30 INTERMISSION TO VIEW THE EXHIBITS

11:00 "Fractures about the Elbow Joint—to Cover All Bony Parts Entering Into the Joints"

"Fractures Around and In the Ankle Joint"

KELLOGG SPEED, M.D., Chicago, Ill.

Rush Medical College 1904. Professor of Clinical Surgery, Rush Medical College; author of a standard text-book on fractures and dislocations; attending surgeon, Presbyterian Hospital, Chicago; Fellow, American Surgical Association, American Orthopedic Association, etc.; Chairman, Fracture Committee, A.M.A.

The anatomy of and about the knee joint is briefly reviewed to illustrate the mechanism of injuries and to recall a mental picture to the surgeon during his examination of the patient. A list of the main symptoms of the principal injuries of the knee joint, exclusive of fracture, is given and the essential points and methods of the examination are enumerated. Specimen, films of conditions entering into differential diagnosis, a résumé of the author's findings in over 250 cases and the complications involving the internal structures of the joint are summarized.

11:30 "Federal and State Co-operation in Maternal and Child Health Services"

KATHARINE F. LENROOT, Washington, D. C.

University of Wisconsin, 1912. Since 1914 with U. S. Children's Bureau, serving as assistant director until 1921, making studies of provision for dependent children and of methods of juvenile-court administration. In 1921 appointed Director, Editorial Division; 1922, Assistant Chief; appointed in 1934 as Chief of the Children's Bureau; Past President and now a member of the Executive Committee, National Conference of Social Work; member of the President's "Advisory Committee on Education."

All the forty-eight states, Alaska, Hawaii, and the District of Columbia are coöperating with the Children's Bureau, through their State departments of health, in the extension and improvement of maternal and child health services, and all the States but one are coöperating with the Bureau also in diagnostic treatment, and after-care services for crippled children. Under the program of Federal aid to the States authorized by the Social Security Act, the official State agencies, under plans developed in consultation with representatives of the medical profession and other interested groups, are bringing to mothers and children, especially in rural areas and small cities, expert medical advice and public health nursing, nutrition, dental health, school health, immunization, and health education service. Likewise State agencies entrusted with responsibility for services for the restoration of crippled children to lives of maximum usefulness and satisfaction are aided to develop a well-rounded program in which due attention is given to the physical and the social problems with which these children are confronted. Experience in Michigan under the crippled and afflicted children's acts affords an unusually broad field for analysis and demonstration of how public services for the medical care of children may best be organized.

12:00 "The Thyroid Gland and the Function of Reproduction"

ROBERT D. MUSSEY, M.D., Rochester, Minn.

Professor of Obstetrics, Mayo Foundation Graduate School; Head of Section on Obstetrics, Mayo Clinic; Member, American Committee on Maternal Welfare.

Hypothyroidism may be accompanied by disturbances of menstruation, decrease in fertility and abortion. In many instances improvement is obtained by elevation of the metabolic rate by carefully regulated doses of thyroid extract. Insufficient iodin in drinking water may be accompanied by the appearance of colloid goiter at the time of menses or during puberty, pregnancy or the menopause. The high incidence of colloid goiter in certain regions makes it particularly necessary to administer iodin as a prophylactic measure. Simple or hyperfunctioning adenomas or exophthalmic goiter may complicate pregnancy. The results of management of pregnancy and of the complicating thyroid disturbance is discussed.

P. M.

12:30 End of Sixth General Assembly Luncheon

A $50,000 EXHIBIT ARRANGED FOR YOUR CONVENIENCE

THURSDAY AFTERNOON
September 22, 1938

Seventh General Assembly

Grand Ballroom, Fourth Floor, Book-Cadillac Hotel

H. H. CUMMINGS, M.D., Presiding

L. FERNALD FOSTER, M.D., and E. R. WITWER, M.D., Secretaries

P. M.

1:30 "Newer Methods in Neurological Diagnosis and Treatment"

ROY R. GRINKER, M.D., Chicago, Ill.

Rush Medical College, 1921. Formerly Associate Professor of Neurology and Associate Professor of Psychiatry, University of Chicago; at present, Chairman of Department of Neuropsychiatry, Michael Reese Hospital; author of numerous scientific publications and the text "Neurology"; Associate Editor, Tice's "Practice of Medicine" for the neuropsychiatric section.

The most important recent advance in neurological diagnosis has come from the method of electrical recording by means of radio amplification of action potentials or so-called brain waves from the surface of the intact human skull.

THURSDAY AFTERNOON
September 22, 1938

Diagnosis of various types psychoses, types of epilepsies and localization of brain tumors are possible by this method.

Other diagnostic means are associated with the effects of newer chemical therapy of certain metabolic disorders. Prostigmin has an extraordinary effect on myasthenia gravis and can be used as a means of differential diagnosis. Quinine has the same value in myotonia congenita. Ergotamine tartrate acts similarly both therapeutically and diagnostically in migraine.

The greatest recent advance therapeutically is the use of shock treatment for schizophrenia, using either insulin, in sufficient doses to produce coma, or metrazol, a camphor derivative, to produce convulsions. A high percentage of schizophrenics can be brought into remissions or complete recovery. The same methods have afforded some beneficial results in other psychoses. The above advances in diagnosis and treatment will be discussed as well as other minor matters.

2:00 "Recent Changes in the Teaching and Practice of Medicine"

FRED W. RANKIN, M.D., Lexington, Kentucky

M.D., University of Maryland, 1909. Assistant Surgeon, St. Mary's Hospital, Mayo Clinic, 1916-23; Professor of Surgery, University of Louisville, 1922-23; Associate Professor Surgery, University of Minnesota Medical School, Mayo Foundation; Surgeon to Mayo Clinic, 1926-33; Surgeon to St. Joseph and Good Samaritan Hospitals, Lexington, Kentucky, since 1934; author of numerous papers on operative and clinical surgery; Major, Medical Corps, U.S.A.; Commanding officer, Base Hospital No. 26; Member, American Surgical Association, American Protologic Society (Hon.); Social Clinical Surgery, etc.

Practice of Medicine"

This subject deals with two main trends: First, toward specialization; and second, toward socialization. The specialization trend is obvious when one recalls the things that have happened in medical education, namely, the reduction of schools, the elevation of admission standards, and the establishment of definite post-graduate standards. The very fact that about one out of four men now practicing are limiting their work to specialties, is further evidence of this trend. Specialty boards and the other certifying bodies help to elevate the standards of surgery and its specialties likewise, and indicate that specialization is here to stay and probably will increase.

As to the second trend—socialization—I have an idea that that is being definitely fostered by purposeful groups both in state and Federal governments. Just what percentage of the medical profession desires a modified form of socialized medicine, I do not know, but I suspect that there is a small but definite group who would welcome it. Naturally, I approve of the policies of organized medicine which oppose vigorously socialized medicine, and believe in slow and orderly evolutionary changes which elevate standards of medical practice which insure adequate service to all groups.

2:30 "The Tuberculosis Program and the Practice of Medicine"

HORTON CASPARIS, M.D., Nashville, Tenn.

Johns Hopkins Medical School, 1919. Children's Department, Johns Hopkins, 1920-24; Professor of Pediatrics, Vanderbilt University Medical School, 1925 to present; Member, Board of Directors, National Tuberculosis Association; President, Tennessee Tuberculosis Association.

Tuberculosis is the most serious communicable disease we have. It is preventable and controllable, and the responsibility for this rests with the general medical profession rather than with the tuberculosis specialist. The specialist is for the purpose of helping us in general practice, rather than shouldering the burden himself. If we apply the knowledge which is available concerning the control of tuberculosis, then the disease can be reduced to a minimal problem. But it is only through our constant every-day practical working vigilance such as we apply to other preventable diseases, that the above can be accomplished. An attempt will be made to outline practical methods which we can all use to lessen the burden of tuberculosis and get it under control.

3:00 INTERMISSION TO VIEW THE EXHIBITS

3:30 "The Conservative Treatment of Orthopædic Conditions"

ALLEN FISKE VOSHELL, M.D., Baltimore, Md.

Johns Hopkins, 1919. Professor, Orthopedic Surgery, University of Maryland; Director and Surgeon-in-Chief, Kernan Hospital for Crippled Children; Chief Visiting Orthopedist, Baltimore City Hospitals, University Hospital; Visiting Orthopedist, Mercy, Woman's, Union Memorial Hospitals; author of numerous publications on Orthopedics; Lt. Commander, Medical Reserve Corps, U. S. Navy, Fellow, American Academy of Orthopedic Surgeons; Member, Robert Jones Orthopedic Club, American Orthopedic Association, American Academy of Orthopedic Surgery.

By the above title is meant the treatment of orthopedic conditions without considering operative procedures, except as incidental associations or as preliminary to the institution of after care. In other words, the text will not describe operations nor statistics developed upon operations per se. It is desired that a realization of the value of time, development, physical and occupational therapy, vocational training and mental education be implanted in the minds of the members of the medical profession. Too much stress and importance is now being placed upon surgery and not enough upon the really more important and permanently stable aspects of orthopedic treatment. Social welfare will be discussed from the standpoint of both the patient and his family, relative to the changes incident to prolonged hospitalization, etc.

A plea for a fully rounded and balanced program of care of the crippled will be made.

4:00 "Treatment of Common Diseases of the Skin"

HOWARD FOX, M.D., New York

Professor of Dermatology and Syphilology, N. Y. U. College of Medicine; Visiting Dermatologist and Syphilologist-in-charge, Bellevue Hospital; Consulting Dermatologist to numerous hospitals (15) in metropolitan area; Member, Board of Directors and Former President, American Dermatological Association; President, American Board of Dermatology and Syphilology; President American Academy of Dermatology and Syphilology; Editor-in-Chief, Archives of Dermatology and Syphilology; Honorary or Corr. Member of ten foreign dermatological societies.

Treatment mainly from the standpoint of personal experience: Acne, value of x-rays, failure of vaccine and hormonal therapy; Rhinophyma, scarification, desiccation, excision; Rhus dermatitis, densensitization; Bromoderma, saline injections; Herpes, small pox vaccine, snake venom; Zoster, pituitrin, iodides, paraffin spray for pain; Psoriasis, anthralin, coal tar (Goeckerman method); Lupus erythematosus, gold, bismuth, quinine, local use of gold; Pemphigus, failure of germanin; Sycosis, quinolor ointment; X-ray epilation vs. fractional doses; Lupus vulgaris, salt free diet; Papulo-necrotic tuberculide, antisyphilitic treatment; Furunculosis, vaccines, toxoid; Impetigo, Alibour water, dyes; Erysipelas and chancroid, sulfanilimide; Verrucæ, curette, mercury internally, x-rays, suggestion; Epithelioma, radium, desiccation, Coutard method.

4:30 End of Seventh General Assembly and the Convention

TECHNICAL EXHIBITS

Akron Truss Company **Space No. 75**
Detroit, Michigan
Complete showing of Surgical Appliances including Akron Trusses, Belts, Surgical Corsets, Orthopedic Braces, Limbs, Hosiery, et cetera. Mr. Ed. W. Alexander, Manager, and Mrs. C. T. Roache, Surgical Fitter, will be on duty in Booth No. 75 to explain the new improvements of Akron Appliances. Twenty-three years' service to Michigan Physicians makes this the foremost exhibit of its kind.

A. S. Aloe Company **Space No. 4**
St. Louis, Missouri
A. S. Aloe Company, in Space No. 4, will display a general line of surgical instruments, supplies and equipment for the physician and hospital. The Aloe Short Wave Diatherm, the DeBakey Blood Transfusion Unit and many other specialties will be featured. The Michigan representative of the Aloe Company will supply those interested with brochures on Aloe Steeline, the most modern development in physician's fine treatment room furniture.

Arlington Chemical Company **Space No. 15**
Yonkers, New York
The Arlington Chemical Company will feature their Biological and Pharmaceutical Products at the Michigan State Medical Society convention. A diagnostic protein outfit offered at $9.75 consists of eighty of the most common factors in allergic conditions. Representatives in charge of the booth will be pleased to discuss any allergic problems.

The Bard-Parker Company, Inc. **Space No. 7**
Danbury, Connecticut
Among the Bard-Parker products exhibited at booth No. 7 are Rib-Back Blades, Renewable Edge Scissors, stainless steel, Lahey Lock Forceps, Formaldehyde Germicide and Containers for rustproof sterilization of surgical instruments, and Hematological Case for obtaining blood samples at the bedside.

Bilhuber-Knoll Corporation **Space No. 38**
Jersey City, New Jersey
Drugs you can use every day—Dilaudid hydrochloride for pain and cough relief; Theocalcin and Phyllicin for purine medication in heart diseases; Metrazol for stimulation in the emergency; and your old friends, Euresol and Bromural, can be discussed with well-informed representatives at this exhibit.

Burroughs-Wellcome & Company **Space No. 12**
New York, New York
The Burroughs-Wellcome & Company exhibit at Booth No. 12 presents a wide range of new and important advances in pharmacological and chemical research.

S. H. Camp & Company **Space No. 22**
Jackson, Michigan
You are cordially invited to visit Booth No. 22 where S. H. Camp & Company, manufacturers of scientific supports, will have representatives to instruct you in the latest developments of Camp Supports, show you samples and fully explain their use and application. Supports are constantly being improved to meet changing needs and these improved phases will interest you.

Coca-Cola Company **Space No. 70**
Atlanta, Georgia
Coca-Cola will be served to the physicians with the compliments of the Coca-Cola Company.

Cottrell-Clarke, Inc. **Space No. 64**
Detroit, Michigan
A real surprise awaits the doctor who has failed to keep in intimate touch with Michigan's own case record house, Cottrell-Clarke, Inc., Detroit. At their exhibit will be shown every form of case record, from those especially devised for the urban practitioner to their latest scientific developments for the big city specialist, clinics and hospitals.

R. B. Davis Company **Space No. 66**
Hoboken, New Jersey
Enjoy a drink of delicious Cocomalt at Booth No. 66. Cocomalt is refreshing, nourishing and of the highest quality. It has a rich content of Vitamin D, Calcium and Phosphorus to aid the development of strong bones and sound teeth; Iron for the blood; Protein for strength and muscle; Carbohydrate for energy.

Detroit X-Ray Sales Company **Space No. 59**
Detroit, Michigan
This Company again takes pleasure in presenting to the Profession the products of the F. Mattern Manufacturing Company of Chicago, and extends a cordial invitation to visit our booth and inspect a radically new design of Shockproof X-Ray Machine attractively priced. Be sure to stop at Booth No. 59.

Dictaphone Sales Corporation **Space No. 71**
Detroit, Michigan
The Dictaphone Sales Corporation cordially invites you to inspect its display of Dictaphone equipment in Space No. 71, and to discuss its application in the medical profession with those in attendance. Dictaphone Dictating machines with Nuphonic recording, Transcribing machines with Nuphonic reproduction, together with S-12 Shaving machines will be on demonstration.

Duke Laboratories, Inc. **Space No. 52**
Long Island City, New York
At Booth No. 52, the Duke Laboratories, Inc., will demonstrate the original, American-made, stretchible, adhesive-surfaced bandage, Elastoplast, approved by the American College of Surgeons. Elastoplast is used whenever compression and support are required, and is rapidly taking the place of the Unna Boot in the treatment of varicose ulcers. Samples of Mediplast, the Elastoplast speed compress used in the treatment of minor injuries may be had, also samples of Nivea and Basis Soap—the prescriber's cosmetics.

Electray Equipment Company **Space No. 33**
Detroit, Michigan
We will show the Peerless Laboratories products, featuring a new model six meter ultra short wave, which is designed to produce maximum power output with low power consumption and especially the ability to heat low resistance tissue. Other Peerless products include a new sine and galvanic generator operated with vacuum tubes minus motor and rotating parts and their new x-ray equipment now manufactured in the same factory.

General Electric X-Ray Corporation
Chicago, Illinois **Space No. 53**
It is the policy of the General Electric X-Ray Corporation to try, at each meeting of the Michigan State Medical Society, to have an interesting exhibit for the visiting doctor. All we ask is that he pay us a visit and meet our representatives who are very helpful in the matter of x-ray and physical therapy problems.

Gerber Products Company **Space No. 45**
Fremont, Michigan
Gerber's, manufacturers of strained foods, in Booth No. 45, cordially invite you to inspect the strained foods on display. Two kinds of literature are available for examination and will be sent to you, on request. Part of this literature is for professional use only, but the booklets are available for distribution to mothers or adult patients on therapeutic diets.

Gordon Shoe Company **Space No. 72**
Detroit, Michigan
Shoe Prescriptionists for twenty-two years in providing foot comfort to men, women and children. The Gordon Shoe Company has an established reputation for carrying out "Doctor's orders." You will enjoy a visit to their display and the opportunity to view a distinct and comprehensive exhibit of their famous Ground Gripper Footwear.

Hack Shoe Company **Space No. 3**
Detroit, Michigan
The first display to greet your eye when you step off the elevator will be that of Detroit's internationally known "Home of Shoe Prescriptions."
Hack will exhibit HACK STABILIZER SHOES for men, women and children; Arch Supportive Gym Shoes for children; Tennis and Basketball shoes for men; Operating Room shoes; Hack-O-Pedic Clubfoot and Surgical Shoes.

Hanovia Chemical & Manufacturing Company
Newark, New Jersey **Spaces No. 5 & 6**
A complete line of ultraviolet quartz lamps, Sollux Radiant Heat Lamps and Short Wave Therapy Units will be on display. Don't fail to see the new innovation, the Super "S" Alpine Sun Lamp. It lights automatically and has ten steps of intensity regulation.

Courteous representatives will be present to welcome you.

J. F. Hartz Company **Space No. 54**
Detroit, Michigan

The J. F. Hartz Company will display the latest and most modern in equipment and apparatus at the September Convention. Especial attention will be given to the new Surgical Instruments. Physiotherapy equipment will also be a prominent feature of the display, and competent, well-informed attendants will be on hand to demonstrate.

H. J. Heinz Company **Space No. 43**
Pittsburgh, Pennsylvania

In order that you may see the natural fresh color and uniform consistency of Heinz Strained Foods, our display presents, in an attractive manner, all twelve varieties. Naturally, you have some questions as to their preparation and uses. We, therefore, invite you to let our representative serve you in this respect.
We will be glad to send you a copy of the fifth edition of our Nutritional Chart, upon registration at our exhibit.

Holland-Rantos, Inc. **Space No. 36**
New York, New York

Several new products in the field of contraception will be displayed at the Holland-Rantos booth. These in addition to the already well known Koromex diaphragm and Koromex Jelly. The new products are: H-R Emulsion Jelly, the new Koromex Diaphragm Introducer and the Bach Pessalator Set.

Horlick's Malted Milk Corporation
Racine, Wisconsin **Space No. 28**

Nourishing, digestible, appetizing—these are three outstanding qualities for which Horlick's is famous, either the powdered or tablet form. Visit Booth No. 28. You will be interested in the many uses—from infant feeding to old age—note especially the convenience of the tablets, for interval feeding in ulcer diets.

The G. A. Ingram Company **Spaces No. 62 & 63**
Detroit, Michigan

The G. A. Ingram Company will exhibit the new Electrocardiograph designed by Charles Hindle and manufactured by the Beck-Lee Corporation. In addition, their exhibit will include the latest physio-therapy equipment, examining room furniture, surgical instruments, and many other specialties that will be of interest to the profession. They will consider it an honor if you will stop and look over their exhibit.

Jones Metabolism Equipment Company
Chicago, Illinois **Space No. 8**

The Jones Metabolism Equipment Company will feature as their display the Jones Motor Basal metabolism apparatus.
A special feature of this unit is that it contains no water and requires no calculation in the determination of the basal metabolic rate.

Jones Surgical Supply Company **Space No. 56**
Cleveland, Ohio

The Jones Surgical Supply Company will exhibit a complete line of surgical instruments, and sundries, short wave diathermy, suction and pressure units, along with numerous specialty items.

A. Kuhlman & Company **Space No. 69**
Detroit, Michigan

A. Kuhlman and Company will show a line of Allison professional furniture, a new high power, low price suction and ether pump, an improved short wave generator, Miller Abbott tube for intestinal intubation, a line of latex uretheral and retaining catheters, a new portable air purifying and odor destroying generator.

Lea & Febiger **Space No. 55**
Philadelphia, Pennsylvania

Lea & Febiger will exhibit the following new works—Pohle's "Theoretical Principles of Roentgen Therapy and Clinical Roentgen Therapy"; Brenner's "Pediatric Surgery"; Perkins' "Cause and Prevention of Disease"; Steel's "Biological and Clinical Chemistry"; Weinzirl's "Hygiene"; Craig & Faust's "Clinical Parasitology"; Fishberg's "Heart Failure"; Davidoff & Dyke's "Normal Encephalogram"; Rowe's "Clinical Allergy"; Saxl's "Pediatric Dietetics," and others.

Lederle Laboratories, Inc. **Space No. 25**
New York, New York

Lederle Laboratories, Inc., will feature a seasonal display of therapeutic sera for all types of pneumococcus pneumonia, Globulin Modified Lederle Antitoxins; Oral and Parenteral Liver, Pergussis Antigen, Diphtheria Toxoid and the Vitamin Products, including Vi-Delga Emulsion (also available in capsule form), and Vitamin B Complex. Literature on all products will be available, as well as samples of the two vitamin products mentioned.

Libby, McNeill & Libby **Space No. 68**
Chicago, Illinois

Libby, McNeill & Libby extend a cordial invitation to all physicians to visit the Libby booth and enjoy samples of Libby's fruit juices. The many advantages of Libby's Homogenized Baby Foods, which make babies' vegetables easier to digest than the finest straining or sieving, are graphically presented. You may register for samples and literature of these baby foods.

Liebel-Flarsheim Company **Space No. 50**
Cincinnati, Ohio

Liebel-Flarsheim will exhibit the well-known L-F Short Wave Generators, as well as the famous Bovie Electro-Surgical Units. In addition, other new and useful physiotherapy apparatus will be shown.
A cordial invitation is extended to visit the Liebel-Flarsheim booth No. 50 and have this apparatus demonstrated to you.

J. B. Lippincott Company **Space No. 9**
Philadelphia, Pennsylvania

J. B. Lippincott Company will display NEW books: Bacon—Anus, Rectum and Sigmoid Colon; Thorek—Modern Surgical Technic; Kracke—Diseases of the Blood and Atlas of Hematology; Wilson—Fractures; Wolf—Physician's Business . . . and New Editions of old favorites: McBride—Disability Evaluation; Rehberger—Quick Reference Book of Medicine and Surgery; Thorek—Surgical Errors and Safeguards; and Means—Thyroid and Its Diseases. See also the NEW International Clinics edited by Dr. George Morris Piersol.

M & R Dietetic Laboratories, Inc. **Space No. 47**
Columbus, Ohio

M & R Dietetic Laboratories, Inc., will display Similac and powdered SofKurd. Representatives will be glad to discuss the merits and suggested application of these products.

Mead Johnson & Company **Spaces No. 29 & 30**
Evansville, Indiana

Mead Johnson & Company are distributing, this year an unusually fine souvenir item. It is not only beautiful but extraordinary because it contains no advertising. Ask for your copy of "Parergon."
The complete display of Mead Products includes two new ones.

Medical Arts Surgical Supply Company
Grand Rapids, Michigan **Spaces No. 26 & 27**

The Medical Arts Surgical Supply Company will feature a complete line of Hamilton medical furniture which includes the very attractive Nu Classic & Hometone suites.
They will also show Physiotherapy equipment by Liebel-Flarsheim, stainless steel instruments, rotary compressors, sterilizing and autoclave equipment, and other items.

Medical Case History Bureau **Space No. 40**
New York, New York

Inexpensive Case History Method. A system that shows at a glance the case you want, how many calls you made and when, the patient's history, the developments, diagnosis and treatments, as well as the financial status of each case, is shown in Booth No. 40 by the Medical Case History Bureau. All the history forms are displayed as they are actually kept in their cabinets.

Medical Protective Company **Space No. 39**
Wheaton, Illinois

Ask the Medical Protective Company's representative to explain how his company meets the exacting requirements of adequate liability protection, which are peculiar to the Professional Liability field.

The Mennen Company **Space No. 48**
Newark, New Jersey

The Mennen Company will exhibit their two famous baby products, Antiseptic Oil and Antiseptic Borated Powder. Included in the exhibit will be their complete line of shaving and after-

shave products for men. Be sure to register at the Mennen exhibit to receive your kit of samples, and participate in the prize drawing for Fitted Leather Toilet Kits.

Merck & Company, Inc. **Spaces No. 10 & 11**
Rahway, New Jersey

Vitamin C, an essential dietary constituent, will be the featured display at the Merck booth.
Individuals who are on a restricted diet frequently require a supplemental quantity of vitamin C. To be positive that they obtain the necessary amount and to be assured that the benefit of accurate dosage is derived, vitamin C is best prescribed in the form of Cebione. Cebione is the only vitamin C available that is Council accepted.
For information regarding Cebione, please register at the Merck Booth, No. 10 and 11.

The Wm. S. Merrell Company **Space No. 46**
Cincinnati, Ohio

A number of new and interesting therapeutic agents are on display at the exhibit of The Wm. S. Merrell Company at booth number 46. Representatives in attendance will courteously show and explain any Merrell preparation of interest to visitors. Soricin, Diothane Hydrochloride, Natural Salicylates, Fibrogen and many other familiar time-tried Merrell products are also being shown.

The C. V. Mosby Company **Space No. 2**
St. Louis, Missouri

Among the many new books to be exhibited by the C. V. Mosby Company are: Jensen's "The Heart in Pregnancy"; the Fifth Edition of Porter and Carter's "Management of the Sick Infant and Child"; Pottenger's "Symptoms of Visceral Disease"; Pruitt's "Hemorrhoids"; Watson's "Hernia"; Rea's "Neuro-Ophthalmology"; the Fifth Edition of Crossen's "Operative Gynecology," and the Sixth Edition of Clendening's "Methods of Treatment." Approximately one hundred other volumes will complete the exhibit.

Nestle's Milk Products Company **Space No. 16**
New York, New York

Nestle's Milk Products, Inc., in Space No. 16, are exhibiting an original oil painting as the main feature of their display. The painting represents a nursery scene and is the work of Stephen Csoka, who executed the canvas especially for Nestle.

Parke, Davis & Company
Detroit, Michigan **Spaces No. 17-18-19-20**

A number of scientific accomplishments will be displayed by Parke, Davis & Company's staff of expert technical men in charge of Booths No. 17, 18, 19 and 20. Products of special interest to the medical profession will be shown, including Mapharsen (an advance in antisyphilitic therapy), glandular products (Theelin, Adrenalin and the Pituitrin group); also Meningococcus Antitoxin, and other biological products.

Pelton & Crane Company **Spaces No. 57 & 58**
Detroit, Michigan

The Pelton and Crane Company will exhibit the new 25-Point Pelton Sterilizers featuring 3-speed or Super-Automatic Models both with the famous Pelton "Sentry" Cutoff, self-draining cast-bronze boiler, enclosed type heater, and many other exclusive features. Also on exhibit will be the new Pelton Utility Light and the Pelton Super-Sterilizer for correct pressure sterilization in the private office, as well as representative models of the complete Pelton line of surgical Cuspidors.

Pet Milk Company **Spaces No. 41 & 42**
St. Louis, Missouri

An actual working model of a milk condensing plant in miniature will be exhibited by the Pet Milk Company in booths numbers 41 and 42. This exhibit offers an opportunity to obtain information about the production of Irradiated Pet Milk and its uses in infant feeding and general dietary practice. Miniature Pet Milk cans will be given to each physician who visits the Pet Milk Booth.

Petrolagar Laboratories, Inc. **Space No. 67**
Chicago, Illinois

Physicians are cordially invited to visit the new convention display at Booth No. 67 where Petrolagar Laboratories, Inc., will be represented by Messrs. R. J. Corkery and L. F. Harrison.
New literature, samples and information regarding Petrolagar will be available.

Philip Morris & Co., Ltd. **Space No. 21**
New York, New York

Philip Morris & Co. Ltd., Inc., will demonstrate the method by which it was found that Philip Morris cigarettes, in which diethylene glycol is used as the hydroscopic agent, are less irritating than other cigarettes. Their representative will be happy to discuss researches and problems on the physiological effects of smoking.

Physicians Equipment Exchange **Space No. 73**
Detroit, Michigan

Renewed medical equipment will be exhibited at Booth No. 73. Something entirely new in medical equipment for your close inspection. Used, but indistinguishable from new. Completely re-enameled and re-finished with a new furniture guarantee. (Ask the doctor who has bought our renewed medical equipment). Save half your cost.

Picker X-Ray Corporation **Space No. 23**
Detroit, Michigan

The very latest in a moderate priced Radiographic and Flouroscopic shock proof and ray proof tilt table, containing all the features of an X-ray and Fluoroscopic plant.
Radiographic and Fluoroscopic accessories of proven merit, such as Keraphen, Basolac, etc.

Pocahontas Fuel Company **Space No. 74**
Detroit, Michigan

A demonstration of Heating with Coal for Health's sake by the "O.P." completely Automatic Stoker.
Dustless coal fed from bin to furnace throughly burned and ash completely removed to dust-proof cans with no clinker formation. This maintains circulation of air at even temperature, the two salient requirements of body comfort and health.
Doctors, discuss your heating problems with our heating engineers.

Professional Management **Space No. 65**
Battle Creek, Michigan

"A Complete Business Service to the Medical Profession."
Discussing office procedures, supervision of collections, and office management; showing samples of efficient office records; distributing reprints from the Michigan State Medical Journal on "The Business Side of Medicine."

Randolph Surgical Supply Company
Detroit, Michigan **Spaces No. 13 & 14**

A 1939 medical furniture fair will be presented to Michigan physicians by the Randolph Surgical Supply Company. Whether or not you need new equipment, this exhibit will be worth your inspection. A varied assembly of the newest Hamilton examining tables, cabinets, et cetera, embodying advanced features of efficiency and design will be shown. Diagnostic instruments, surgical supplies, short wave and electrical equipment will be included in the display.

Sandoz Chemical Works, Inc. **Space No. 24**
New York, New York

"Gynergen" (Ergotamine Tartrate) for the dramatic relief of migraine; "Calglucon" (Calciumgluconate) in granules, effervescent and chocolate flavored tablets; "Neo-Calglucon," for parenteral administration; "Scillaren" and "Scillaren-B," the cardioactive principles of squill; "Digilanid," crystallized initial glucosides of digitalis lanta; the neurovegatative sedatives, Belladenal, Bellergal and Calcibronat; Basergin and Neo-Gynergen for obstetrical use.

W. B. Saunders Company **Space No. 49**
Philadelphia, Pennsylvania

W. B. Saunders Company will exhibit a complete line of their books for the medical, dental, nursing and allied professions. Included in the many new books and new editions will be a brand new edition of Beckman's "Treatment," Herman's new "Urology," Buie's "Practical Proctology," Max Cutler's new Cancer book, Barsky's new "Plastic Surgery," as well as many other editions.

Smith, Kline & French Laboratories **Spaces**
Philadelphia, Pennsylvania **No. 34 & 35**

Smith, Kline & French Laboratories will distribute samples of "Benzedrine Inhaler," their Volatile vasoconstrictor. Another form of ban-

zyl methyl carbinamine S.K.F. will also be shown—"Benzedrine Solution"; as well as Pentnucleotide, for agranulocytosis.

E. R. Squibb & Sons **Space No. 44**
New York, New York
Physicians attending the Michigan State Medical Society Convention are cordially invited to visit the Squibb exhibit. The complete line of Squibb Glandular, Vitamin, Arsenical and Biological Products and Specialties, as well as a number of interesting new items will be featured.
Well informed Squibb representatives will be on hand to welcome you and to furnish any information desired on the products displayed.

Frederick Stearns & Company
Detroit, Michigan **Spaces No. 60 & 61**
Doctors are invited to visit our booth where various outstanding contributions to medical science will be exhibited in a beautiful new modern display.
Information on such outstanding products as Neo-Synephrin Sterile Solution for parenteral use in acute hypotension; Appella Apple Powder for infantile diarrheas; Trimax, Hydrated Magnesium Trisilicate; Insulin-Stearns; and other new and interesting products will be supplied by Stearns' capable representatives.

Van Hoosen Farms **Space No. 37**
Rochester, Michigan
Our display will emphasize three points: (a) The cleanliness and nutritive value of certified milk. (b) The production and importance of Metabolized Vitamin D Milk. (c) The high Vitamin A content of Holstein milk.

James Vernor Company **Space No. 1**
Detroit, Michigan
Vernor's Ginger Ale needs no introduction in medical circles. Its manifold uses are familiar to dietitian and surgeon alike. The dry ice dispenser shown at Booth No. 1 at the M.S.M.S. Annual Convention and Exhibition with an appropriate display of Vernor's products, is the latest development for party uses. This unit is designed to serve a cold, tangy glass of Vernor's with all the efficiency of a fountain. Our hostess will be pleased to arrange for this service with a neat booth or stand, as you may desire.

Wall Chemicals, Inc. **Space No. 31**
Detroit, Michigan
A display of all types of medical gas cylinders and equipment and their different uses in conjunction with gas-ether anesthesia machines and oxygen tents, et cetera. Complete disassembled valves will also be on exhibit, in order that the medical gas users will be able to gain a better conception of their structure.

John Wyeth & Brother, Inc. **Space No. 32**
Philadelphia, Pennsylvania
Booth No. 32, John Wyeth & Brother, Philadelphia, will feature Silver Picrate in the treatment of Trichomonas Vaginalis Vaginitis. The use of Silver Picrate in the treatment of Trichomonas Vaginitis is extremely simple, consisting of two insufflations of the Powder and supplemental use of Silver Picrate Suppositories. Silver Picrate, Wyeth, is also available in crystalline form for the preparation of fresh solution. Physicians are cordially invited to stop at the Wyeth Booth and receive full information concerning Silver Picrate and its use in Trichomonas Vaginalis Vaginitis.

The Zemmer Company **Space No. 51**
Pittsburgh, Pennsylvania
The Zemmer Company, Pittsburgh, Pennsylvania, manufacturers of a complete line of ethical pharmaceuticals, will occupy Space No. 51 at the 1938 Detroit Convention of the Michigan State Medical Society next September. A cordial invitation is extended to members of the medical profession to visit Exhibit Space No. 51.

The Zimmer Manufacturing Company
Warsaw, Indiana **Space No. 76**
The Zimmer Manufacturing Company will exhibit a complete line of fracture appliances. Among some of the new items of special interest are Smith-Petersen Nail accessories, Goniometers, Orthopedic Wrenches, Wangensteen Aspirators, New Types of Orthopedic Braces, et cetera. Mr. C. A. Fisher will be in charge of the booth.

ANNUAL REPORT OF THE COUNCIL, M.S.M.S., 1937-38

Since the 1937 session of the House of Delegates, the Council has convened four times (up to Sept. 19, 1938) and the Executive Committee eight times —a total of twelve meetings. As in the past, all M.S.M.S. officers were invited to meetings of the Executive Committee, and the minutes of its transactions were mailed to all councilors and officers, as well as published in THE JOURNAL. The matters studied by the 23 committees of the M.S.M.S. were routinely referred to The Council or its Executive Committee, for consideration and approval; in the main, the chairmen of these committees were invited to be present at the monthly meetings of the Executive Committee. The large attendance at these sessions testified to the intense interest of an increasing group of members who are working in behalf of the Michigan State Medical Society.

Membership

Members in good standing as of December 31, 1937, totalled 3,963, a gain of 238 over the preceding year. The membership as of July 31, 1938, totalled 3,958, compared with 3,757 as of the same date in 1937. The membership will be increased by the time of the Annual Meeting in September.

Despite the "rescession" of 1938, the increased activities of the State Society and a resulting appreciation of the benefits of membership, interested a good number of physicians to affiliate as new members of organized medicine, and also helped to sustain the regular membership total to a very satisfactory figure. We are sure the members feels they are deriving benefits from their investment.

Your Council considered a change in the Constitution (Article Three, Section One), to insure that active membership in a county medical society shall include active membership in the State Society, and respectfully recommends to the House of Delegates that the present Section be amended by adding, after the words "have been paid," the following sentence: "Membership in a County Medical Society on a basis not including membership in the Michigan State Medical Society is not recognized."

Finances

The auditor's report, containing the financial statement of the Society for 1937, was printed in THE JOURNAL (Feb., 1938, pages 173-4-5).

During the year past, detailed reports on the financial condition of the Society were presented monthly to the Executive Committee of The Council; also analyses of the budget versus actual expenditures were made periodically.

A special committee on securities was appointed to present quotations on the M.S.M.S. bonds and the valuation of same, at meetings of the Executive Committee.

While it is difficult to ascertain how the current year will come out from the financial standpoint, your Council believes that it will be several thousand dollars in the black at the end of December, 1938, despite the payment this year of a $3,500.00 debt carried over from 1937 operations. This favorable condition is in the face of an extension in 1938 of many activities in behalf of practitioners and of the public.

Journal

At the beginning of 1938, your Council prophesied a sharp decline in JOURNAL advertising revenue, because of the times. In the main, this has not been realized to date, due to increased activity in the Executive Office which has not only maintained

steady promotion with advertisers and prospective advertisers, but has mailed hundreds of letters to the membership, to stimulate greater reader-interest.

THE JOURNAL has been limited to 100 pages per issue, to keep down expense. The quality of the scientific articles is as high as ever; the interest in the Society Activity Department has been increased by new innovation and personalizing. The special souvenir editions (the Directory Number in May and the Convention Number in September) have been continued, resulting in increased revenue.

The Council recommends an increase in the use of professional cards in THE JOURNAL.

The Council aims to keep the membership thoroughly informed concerning every activity of the State Society through the columns of the JOURNAL.

Contacts With Governmental Agencies

The outstanding feature of the Michigan State Medical Society's activity during the past year has been the extraordinary increase in contacts with agencies of government, including the Board of Labor and Industry, the Attorney General, the Auditor General, the Michigan Crippled Children Commission, the Michigan Department of Corrections and Parole, the Welfare Department, the Civil Service Commission, the Department of Public Instruction, the State Hospital Commission, the Department of Drugs and Drug-stores, the Old Age Pension Bureau, the State Accident Fund, the State Insurance Department, the Governor's Survey Committee, the State Board of Registration in Medicine, and the State Department of Health. In the main, these contacts have been two-fold: the various state departments have called upon the Michigan State Medical Society for technical advice and counsel; the State Society has presented to governmental agencies the problems of individual physicians and of the State Society as a whole, for solution.

The Labor Board sought help in the administration of the Occupational Disease Law.

The Attorney General (through the State Board of Registration in Medicine) requested the State Society to write a booklet on the "evils of marihuana." The State Society sought a modification of the Attorney General's opinion on "x-ray interpretation."

Numerous meetings were held with the Auditor General and with the Crippled Children Commission relative to problems associated with the Afflicted-Crippled Child Laws; it is gratifying that on June 1, 1938, a final settlement of the problem of certain specialists in connection with these laws was made, in that in future, radiologists, pathologists and anesthetists are recognized as practitioners of medicine, and are placed in Schedules A and C. In addition, the Crippled Children Commission called upon the State Society to develop a brochure on "Treatment of Burns."

The Department of Corrections and Parole called upon the State Society for technical assistance re medical service in penal institutions.

Numerous contacts were made with the Welfare Department re medical care of the indigent, the WPA employee, and the possibility of a rehabilitation program in Michigan.

Contact was made with the Civil Service Commission, with the Parole Board, and with the State Hospital Commission re complaint that physicians in state institutions would be required, under the Civil Service Commission regulations, to furnish care to state employees, who would receive payment in kind, other than cash salaries.

The Department of Public Instruction sought help from the State Society re problems of the unusual child.

The Department of Drugs and Drugstores was contacted frequently re the State Narcotic Law and the special fee imposed upon physicians.

The Old Age Pension Bureau was visited frequently re some plan whereby recipients of Old Age benefits could obtain necessary medical care from their family physicians.

The Governor's Medical Survey Committee, created to aid the state and county medical societies with a portion of the A.M.A. Survey, held meetings with M.S.M.S. representatives on three occasions.

Through a coöperative arrangement of the State Department of Health and the State Board of Registration in Medicine, an inspector was appointed during the past year to investigate violations of the Medical Practice Act. The contact of the State Society with these two governmental agencies in all matters has been frequent and most cordial.

The State Accident Fund sought the help of the State Society with problems of so-called medical care by irregulars.

The State Insurance Commissioner was seen frequently regarding the activities of cultists, and the organization of commercial concerns offering group hospitalization.

Contacts With Unofficial Groups

Friendship with other groups interested in medical services was strengthened during the past year: with the Michigan State Dental Society, which now has a full-time Executive Secretary in Lansing; with the pharmaceutical group, with whom relations have been very harmonious; with the State Bar of Michigan, which sought the help of the M.S.M.S. with its Supreme Court Amendment. Other groups contacted during the year included the Michigan Conference of Social Work, the newly-formed Michigan Health League, the Michigan State Board of Registration of Nurses, which met with a committee appointed by the Council to study (in compliance with instructions of the House of Delegates) the requirements for Nurses Training Schools; this committee held several meetings with the State Board of Nurses but failed to secure a wholesome coöperation from its representatives, and the objectives were not realized.

"Group Hospitalization" was discussed with representatives of the Michigan Hospital Association at several conferences, but no agreement was reached.

An endeavor to secure liens for physicians in accident and health cases is being negotiated with insurance companies, in order to obtain this result by arbitration rather than attempt to seek approval from the Legislature.

Other contacts were made with the health officers at their annual June conference, with the Michigan Public Health Association at its November meeting, and with representatives of sixteen state medical societies at the Northwest Conference in Chicago in February, on which occasion your M.S.M.S. Secretary was elected Secretary of the Conference, which honor to Michigan carries with it the obligation of being Conference Host in 1940.

Organization

The 1936 House of Delegates made it mandatory that the officers of the Michigan State Medical Society visit all county medical societies once a year.

This order has been obeyed in 1937-38, with visitations by your President, or Secretary, members of The Council, members of the Public Re-

lations Committee or the Executive Secretary. This travel has been done not without great personal sacrifice on the part of your State Society officers—the hours going to, attending, and returning from meetings representing an aggregate of approximately two months away from their offices.

The A.M.A. Survey required much additional work and travel this year, the officers and Public Relations Committee members being specifically invited by county medical societies to visit them and explain the details of this monumental work. The U. P. Secretaries' Conference of May 15 in Marquette was a case in point. It is apparent that county societies are looking more and more to the Michigan State Medical Society for guidance and counsel; in addition, individual councilors requested visitations by M.S.M.S. officers, to help solve acute problems in their districts. During the past year, it was necessary to contact several inactive county medical societies and awaken them to their responsibilities and opportunities.

Your State Society officers attended 25 "State Society Nights" arranged by county medical societies; in addition, they accepted frequent invitations to address county units during the past year.

It is anticipated that as much, if not more, travel will be pressed upon the Councilors, officers and the Executive Secretary of the State Society during the ensuing 12 months, if good organization throughout the 83 counties is to be maintained.

The Council feels that any extra travel expense of the past two years has been more than offset by greater activity of the county units reflected in a keener coöperation in such important activities as legislation, postgraduate medical education, and socio-economic matters; it has resulted in an apparent appreciation by county medical societies of the State Society's efforts to assist them with their acute problems. Moreover, the individual members of the M.S.M.S. gain a personal acquaintanceship with the State Society officers—get to know them in the flesh and have an opportunity to present their own problems to them face to face, at a round-table discussion—with the result that more members seem to have added confidence in the Michigan State Medical Society and greater satisfaction and pride in their association with the organization.

The Council recommends the continuation of two secretaries' conferences each year, one on the occasion of the annual meeting, and the other in mid-winter. It feels that the innovation of the Secretaries' Conference of the U. P. societies was worth while.

Your Council recommends the merger of the Delta and Schoolcraft county medical societies; also the partition of the present 13th Councilor District, as requested by the county medical societies comprising same, and the re-numbering of the 17th Councilor District in the Upper Peninsula, to the "13th District."

The Council reiterates its oft-repeated recommendation that county medical societies retain efficient secretaries and delegates.

County Societies

More county societies have elicited greater activity this year than ever was apparent in the history of the Michigan State Medical Society. Approximately 12 county units have instituted outstanding programs which merit commendation, and emulation by other county medical societies. An example of this is the Ingham County Society's "Syphilis Control Program" which was presented to the M.S.M.S. for approval, and subsequently was given coöperation by the U. S. Public Health Service.

The Secretary's Letters were sent monthly to county society presidents, secretaries and delegates; and four times during the year to all members of the M.S.M.S.

The Medical History of Michigan was presented to physicians who attended the January Secretaries' Conference, for distribution to local public, medical, and hospital libraries of the state.

The scientific programs of most county medical societies were well worth while; some of the smaller societies were assisted in securing speakers through the M.S.M.S. It is again recommended that county societies give time on their programs for organizational and socio-economic discussions. We feel that every society should be visited by some of the State Society officers at least once a year.

Committees

To best appreciate the volume of work done by the State Society, we have but to look at the accompanying analysis of meetings of the Council and its Executive Committee, and the twenty-three other committees of the M.S.M.S.

COUNCIL AND COMMITTEE MEETINGS

1937-1938

Committee	Date	City	Number Meetings
Council	9/28	Grand Rapids	3
	1/12-13	Detroit	
	8/3	Pt. L.	
Executive Committee of Council	10/17	Detroit	8
	11/10	Detroit	
	12/12	Detroit	
	2/9	Grand Rapids	
	3/13	Detroit	
	4/14	Lansing	
	5/18	Eloise	
	6/30	Washington Co.	
Legislative	11/10	Detroit	6
	2/27	Lansing	
	3/30	Flint	
	5/24	Detroit	
	7/28	Detroit	
	8/14	Lansing	
Joint Comm. on Health Education	6/22	Ann Arbor	1
Dist. of Medical Care	12/8	Detroit	3
	1/12	Lansing	
	6/12	Lansing	
Cancer	9/28	Grand Rapids	5
	11/26	Ann Arbor	
	12/12	Ann Arbor	
	3/12	Detroit	
	5/28	Ann Arbor	
Preventive Medicine	9/29	Grand Rapids	4
	11/14	Lansing	
	1/19	Flint	
	5/22	Detroit	
Syphilis Control—Subcommittee	9/30	Grand Rapids	4
	11/14	Lansing	
	1/9	Flint	
	5/22	Detroit	
T. B. Control—Subcommittee	11/14	Lansing	4
	11/26	Lansing	
	1/7	Lansing	
	5/20	Lansing	
Woman's Auxiliary	11/17	Lansing	2
	5/5	Lansing	
Radio	No meeting; work done in collaboration with Joint Committee on Health Education		
P. G. Medical Education	12/16	Detroit	2
	4/20	Detroit	

Maternal Health	11/4	Detroit	4
	12/12	Lansing	
	5/18	Ann Arbor	
	6/7	Lansing	
Public Relations	1/22	Lansing	2
	3/23	Lansing	
Contact Com. of Gov't Agencies	3/2	Lansing	6
	3/27	Flint	
	5/4	Lansing	
	5/21	Lansing	
	6/1	Lansing	
	6/22	Lansing	
Mental Hygiene	11/11	Detroit	3
	1/20	Detroit	
	3/24	Eloise	
Ethics	3/20	St. Louis	1
Occupational Diseases	10/21	Detroit	2
	1/11	Detroit	
Parole Commission, Advisory to	12/12	Detroit	2
	1/17	Jackson	
Membership	No meeting; work done through correspondence		
Rep. to Mich. Health League	12/1	Detroit	3
	1/5	Pontiac	
	3/9	Pontiac	
Medico-Legal	4/2	Detroit	1
Liaison with Hospitals	3/16	Detroit	3
	4/13	Detroit	
	5/18	Eloise	
Liaison with State Bar	No meeting; contacts made direct with State Bar		
Committee on Scientific Work	2/20	Lansing	2
	3/27	Lansing	
Total Committee Meetings			60
Total Council and Executive Committee Meetings			11

TOTAL MEETINGS PER MONTH

September	4	January	10	May	11
October	2	February	3	June	6
November	10	March	11	July	1
December	7	April	4	August	2

All committee work was reviewed by The Council and by the Executive Committee.

The Postgraduate Medical Education Committee has expanded its progressive program, and has opened a new center (in Ann Arbor). The detailed program in the Handbook for Delegates outlines the accomplishments of this committee. An innovation is the awarding of Certificates of "Associate Fellowship in P. G. Education," after four years' p. g. activity by physicians; and the Gold Award or full "Fellowship" after eight years' work. The future of medicine depends upon the quality of medical service given by the average practitioner of medicine. Postgraduate medical education is raising the quality of practice, and its augmentation will help solve some of the problems which face the profession.

The Legislative Committee made plans during the past year for the 1939 session of the Legislature and of Congress. Many legislative friends of 1937 are seeking re-election, which must be a signal for action on the part of the medical profession between now and election day, November 8. The Council recommends that no aggressive legislation be sought by the M.S.M.S. in 1939; however, many destructive proposals must be stopped, to the end that medical practice is kept on a high plane. The Legislative Committee sent a number of bulletins to the various key-men in the county medical societies during the past year.

Progressive work was done during the past year by the Preventive Medicine Committee and its Syphilis Control Advisory Committee, which, among other activities, recommended desirable changes to improve the Antenuptial Physical Examination Law; by the Tuberculosis Control Advisory Committee, which coöperated with the Michigan Association of Roentgenologists to develop plans for the early diagnosis of tuberculosis; by the Committee of Radiologists; by the Ethics Committee; by the Iodized Salt Committee; by the very active Woman's Auxiliary Advisory Committee, representatives to the Joint Committee on Health Education; the Distribution of Medical Care Committee, which developed a comprehensive survey on medical care of indigents; the Cancer Committee; the Maternal Health Committee, which coöperated with the U. S. Public Health Service in a unique study; the Public Relations Committee on which the responsibility for the success of the A.M.A. Survey was thrown; the Contact Committee to Governmental Agencies (previously outlined); the Advisory Committee to Parole Commission (previously outlined); and the Liaison Committee with Hospital Association. A special committee of the Council, the Medico-Legal Survey Committee, made a study of medico-legal activities in other states of the nation, and presented concrete recommendations that medical defense be continued in this state but that certain changes be made to make it more efficient, which recommendations were adopted by The Council on August 3.

The Committee on Scientific Work developed the 1938 Annual Meeting, with a stellar program and many new attractions which should result in a splendid meeting and a record-breaking registration. It assigned a half-day and evening on the General Assembly to consideration of all phases of "Preventive Medicine."

The Council is grateful and thanks all committee-chairmen and members for their hard work performed in behalf of the 4,000 members of the M.S.M.S.

The cost of this increased committee activity, with benefits to every practitioner of medicine in the State, has been offset by a demonstration of greater activity, interest, and enthusiasm on the part of more M.S.M.S. members than has ever been apparent in our history. This esprit de corps cannot be measured in dollars and cents; but it must be maintained if the Society is to improve and to increase in size, importance and influence.

Emergencies

With the increasing attempts of government to encroach upon the private practice of medicine, the M.S.M.S. has found itself faced with emergencies during the past year which required immediate action. The Socialized Medicine experiment of the HOLC agency in Washington, D. C., is a case in point; this can spread to include all Federal employees in all parts of the U. S., then take in state governmental employees, and finally those of cities, townships, counties, etc., etc., which means that these people will get mechanized service from a handful of politically-appointed physicians who will be inadequately compensated to take care of many of *your* private patients. **The Scott** Resolution introduced into the U. S. Congress this year, and the more recent statement of the U. S. Assistant Attorney General, both sought investigations of every medical society in the land. The emergencies of 1937-38 were met, as they arose. The implications of the Social Security Act, especially with reference to the U. S. Syphilis

Program, required our dispatching to Washington our President, Henry Cook, who alone of all who testified before the Congressional Committee gave the viewpoint of the general practitioner towards clinics for the care of syphilis in Michigan.

The Public Relations Committee was instructed to revise its brochure, "Who Wants Socialized or State Medicine!" because of many requests from other states, as well as from Michigan.

The requests of newspapers for statements on controversial questions were complied with, usually requiring emergency meetings and conferences.

Contacts were made with our two U. S. Senators and 17 Congressmen in Washington, on a number of important medical problems before Congress; friends in Congress were made, especially Congressman Paul W. Shafer of Battle Creek, who championed Medicine in Congress on 2 memorable occasions. A brief on the legal status of chiropractors was developed in the M.S.M.S. Executive Office at the request of a governmental agency.

In view of the multiplicity and increase of our general problems, the medical profession must sustain its activity and must look for an increase in civic endeavor and quasi-public work, as part of its more important and ever-increasing functions.

New Activities

The work of the "Placement Bureau" was increased during the past year, to such a point that hardly a week now goes by without at least half a dozen requests for aid in seeking good locations for medical practice in Michigan.

The "Spot Speakers Service" was created by action of The Council in June. This will aid county medical societies in despatching physicians to address lay groups—a very important activity.

In 1938 the Basic Science Board was appointed and organized.

During the past year, the right to institutional practice by osteopaths was decided by the Circuit Court of Genesee County; in this case, the M.S.M.S. became a party-defendant in order to aid local counsel with legal talent. A determination should be made in the very near future re the right of osteopaths to practice medicine and surgery generally, outside of public institutions.

The Society has a great interest in the Welfare Reorganization Referendum of November 8, and is sending to the membership the pros and cons giving both sides of the question.

The Council recommended to its A.M.A. delegates that they use their influence to secure a Public Relations Bureau in the A.M.A., which plan however was not adopted by the A.M.A. House of Delegates at its San Francisco meeting.

Progress

The Michigan State Medical Society has made progress during the past year—startling progress, when we look back to the Sault Ste. Marie meeting of 1935 and review the recommendations of that House of Delegates, and compare it with the activities of the State Society today.

All the instructions of the House of Delegates have been followed out, to the best of the ability of your Council.

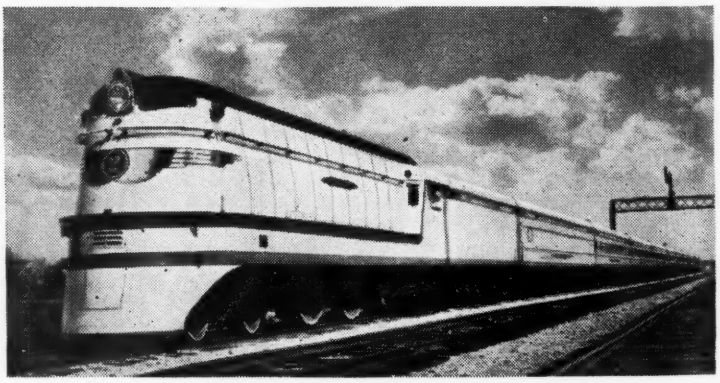
There is yet much to be done, especially with the problem of distribution of medical care, in particular to the relief group, a decision on "group hospitalization," the determination of findings as the result of the A.M.A. Survey, progressive plans if the Welfare Reorganization Laws of 1937 are approved on Election Day, and how to supply medical care to those in the borderline group who need it. In the future, we must expect greater problems and greater work, and therefore greater accomplishments. With continued unity and activity in our own ranks, augmented by even greater contact and coöperation from other unofficial and official groups and interested laymen, the M.S.M.S. and its 54 component county medical societies will go far in their attempt to solve—as they arise—all medical problems in this state. As stated in our report last year, our whole structure depends upon the allegiance of the practitioner of medicine to his county medical society, which exists only for the betterment and welfare of its physician-members and the people whom they serve.

Respectfully submitted,

P. R. Urmston, M.D., *Chairman*
Henry R. Carstens, M.D.
J. Earl McIntyre, M.D.
Wilfred Haughey, M.D.
F. T. Andrews, M.D.
Vernor M. Moore, M.D.
I. W. Greene, M.D.
T. F. Heavenrich, M.D.
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B. H. VanLeuven, M.D.
H. H. Cummings, M.D.
Geo. A. Sherman, M.D.
A. S. Brunk, M.D.
W. A. Manthei, M.D.
P. A. Riley, M.D.

A Streamlined Convention
is awaiting YOU
in Detroit

September 19, 20, 21, 22



Courtesy C. M. St. P. & P. Ry.

President's Page

OUR WATCHWORD—UNITY

THE medical profession of Michigan is desirous that all people shall receive the medical care they need. This is equally true of the future as it has been in the past. Organized medicine has always made every effort to eliminate the quack and charlatan. It has eliminated medical colleges which did not give the student the highest professional training. It has carried on a campaign of health education of the laity. It has always been favorable to a more efficient program of preventive medicine.

It believes that the best in medical care can be attained for all the people under the American plan of distribution of medical care.

The medical profession believes that the practice of medicine should be kept under the control of the physician and that the politician is a very definite threat to good medical care in the future.

They believe that programs of improvement of medical care should be worked out by the medical profession jointly with various local, state and national public health agencies and it should be done without outside interference. The doctor believes that improvements in medical care and its distribution can be best accomplished by improvement upon past attainments rather than jeopardizing that which has already been accomplished.

The practice of medicine must remain sufficiently attractive and give proper financial return if it is to appeal to the best type of individual.

The doctor must keep cool and not be stampeded into surrendering the principles above outlined by accepting unworthwhile compromise.

Unity must be our watchword.

Henry Cook

President, Michigan State Medical Society

THE JOURNAL

OF THE

Michigan State Medical Society

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SEPTEMBER, 1938

"Every man owes some of his time to the upbuilding of the profession to which he belongs."

—THEODORE ROOSEVELT.

EDITORIAL

THE ANNUAL MEETING

SEPTEMBER is the month of good things for the members of the Michigan State Medical Society. It is the opening month for the Society year and also of many of its constituent county medical societies. But we have in mind particularly the Society's annual convention. This has come to be such a large meeting that for the past two or three years it has alternated between Detroit and Grand Rapids, the two largest cities in the state.

The medical profession of Wayne County will be the hosts to the Society this year. The scientific and other programs appear in this number of THE JOURNAL. See for yourselves! The committees in charge of the scientific program have spared no effort to make this one of the most outstanding that has been presented at any state convention, in the United States. Three days of postgraduate work in medicine will be offered.

The commercial exhibits are the most extensive, as well as novel and interesting, that have been shown at any state convention.

Provision is being made for entertainment as well as study.

Detroit welcomes you.

MEDICINE TO BE INVESTIGATED

APPROXIMATELY a month ago, two seemingly unrelated incidents took place. One was the threat of instituting legal proceedings against the medical society of the District of Columbia and the American Medical Association by Thurman Arnold, deputy Attorney-General of the United States, for alleged violation of the Sherman Anti-Trust Laws. Over a year ago, members of the H.O.L.C. in Washington formed an association with a substantial subsidy from the federal treasury. The purpose of the organization was to put into practice what has come to be dubbed State Medicine. The medical society of the District of Columbia in common with all other medical societies of the United States has some time or other expressed disapproval of the corporate practice of medicine, either orally or by denying membership to any doctor who sells his services to a corporation. We use the term "threat" as signifying the action of the assistant attorney-general inasmuch as his ultimatum published in full in the *Journal of the American Medical Association* of August 6th offers the American Medical Association and its component state and county societies an opportunity to change their attitude towards groups who may desire to organize along lines similar to those of the H.O.L.C. group.

In the event of the said medical associations standing pat, their actions will be subject to grand jury investigation to be followed by court proceedings should justification be found. So far as we see it, there is nothing in the attitude of medicine that members of the medical profession need to fear an impartial investigation. They will await the court decisions with intelligent interest.

The other incident referred to above was

the meeting of the National Health Conference which was held in Washington, D. C. An interesting editorial summary of this meeting appeared in the *Journal of the American Medical Association* of July 30th of this year. In attendance were physicians and representatives of correlated professions. Labor, mutual aid and welfare organizations, farm bureaus, hospital workers and government employees also had their representatives. Ten members represented the medical association.

The National Health Program made five recommendations based on its consideration of the health requirements of the United States. The first called for an expenditure of two hundred million dollars by federal, state and local governments for the purpose of public health organization. One half of this sum is to be provided by the federal government, the other half by state and county. In addition to this is one hundred and sixty-five million for the expansion of maternal and child health service. These services are for people of all income groups in all parts of the United States.

The second, third and fourth recommendations were for a ten-year program at an annual cost of $146,500,000, half to be paid by the Federal Government and half by the municipalities. This is to provide new diagnostic and therapeutic services to the nation. The program also calls for an expenditure of $400,000,000 yearly for the medically indigent, half of the sum to be provided by the federal government; the remainder by states and counties.

The fifth recommendation concerned loss of wages during sickness.

Should the recommendations of the National Health Conference be carried into effect, the cost in the increased tax levies will be truly astronomical. It is interesting to note here that there was a discussion on the subject of ways and means. A payroll tax was proposed in order to raise a portion of these huge sums. The C.I.O. representatives, it is reported, favored the gigantic expenditures but would not agree that a dollar of it should come out of industrial payrolls.

Apparently the idea in the minds of most reformers is that anything can be accomplished by the expenditure of enough money. We are reminded of the father who made inquiry of the principal of a ladies college as to how his daughter Mary was getting along. The diplomatic professor replied, "Mary is a good girl and gives little trouble, but she doesn't have the capacity to learn." "Get her a capacity," replied the indulgent father, "and send in the bill and I'll pay it."

The medical profession are for the most part of one mind in their reaction to the recommendations of social reform. Every member of the medical profession should inform himself of the trend of mind of the intelligentsia. They are loud and will be heard and to a greater or less extent heeded by legislators, and hampering laws may result. The medical profession must make themselves heard, too. "It will be a sad day for society," declared Woodrow Wilson, "when the sentimentalists are encouraged to suggest all the measures that should be undertaken for the benefit of the human race."

SOCIALISTIC TRENDS

EVERY now and then we are told what the public wants. The public wants socialized or state medicine. To ascertain the reaction of that small portion of the public with whom we come in contact, we have put the question, Do you want state medicine? Are you in favor of socialized medicine? In almost every instance, we were confronted with a rejoiner. What do you mean by state medicine? Weary of explaining what state or socialized medicine is, we have desisted and have concluded the part of our public who so much desire socialized medicine are the social worker and the social reformer—the vociferous few and not the silent industrious majority.

It is still green in our memories that the Socialists ran a candidate for president—Norman Thomas—a candidate with personal qualities that should have secured for him a large following if his particular brand of political philosophy had any appeal to the nation. Socialism seems to flourish for the most part among the socalled intelligentsia—the parlor type.

Socialism, as all other political philosophies, pre-supposes two groups, a controlling or a regimenting group and the larger group —the controlled. There is no room for free discussion in the land of *isms*. Free discussion is interpreted as treason. The Amer-

ican people do not want anything of the sort. They are satisfied with democracy even with all its faults.

Should socialism become the form of government in the United States, we venture a prediction that neither Norman Thomas nor any of the academic variety of socialist would have anything to do with it. Who would have predicted Hitler even six years ago in "Germany, learned, indefatigable, deep-thinking Germany"; or Mussolini in Italy a dozen years ago? Government is too precious a thing for the unlearned and greedy politician to relinquish from his grasp simply for an ideal.

"When a man like Doctor Cabot makes the ridiculous statement that thousands of young physicians are starving; then implies that the bulk of the lower economic third of the population is not receiving medical care, and then has these wild statements enthusiastically applauded and almost cheered, it is apparent that the meeting is not going to be judicial in its attitude. Such statements are reckless and unproved. If there are thousands of young doctors unable to make a living in this country, we would like to know where they are. Certainly they are not in this section." The *New Orleans Medical Journal* thus comments on Dr. Cabot's address at the National Health Conference in Washington.

STATE MEDICINE

(*New Orleans Medical and Surgical Journal*)

The splendid address of Dr. Charles M. Horton, delivered before the annual meeting of the Louisiana State Medical Society in May and published in the June issue of this journal, should be read carefully and digested thoroughly by every member of the State Medical Society. The address is replete with arguments showing why State Medicine would be harmful to the development of the medical profession in the United States and a distinctly detrimental method of practice as applied to the citizens of this state and country.

There are several statements in this address which well might be restressed and again accentuated. Horton writes, for example, that the practice of medicine is comparable to individual liberty. It is fundamentally an expression of the ethical life and it will suffer to a high degree if its liberty is invaded. State Medicine would contain evils which would probably be worse than those faults it purports to correct. Politics is likely to dominate State Medicine and health measures. Again, to paraphrase Dr. Horton, this is particularly dangerous because there are certain inherent faults with any large system which is governed and controlled politically. He says, furthermore, that there is bound to be a rise in taxation, particularly of interest to those who are called upon to pay the taxes and who resent the present imposts.

Horton says State Medicine is the beginning of the end of state government. The Commonwealth gives up its privileges and prerogatives to let the central government dominate; where it dominates, eventually it controls; once a bureau is established it keeps on getting larger and larger and demanding more and more from the taxpayers.

The advancement of scientific medicine is dependent upon independence in medical practice. The independence of our citizenry has been gained through tremendous trial and prodigious expenditure of blood. Let us not lose the priceless heritage which our forefathers gained for us a century and a half ago; let us maintain our independence; let us preserve our intellectual and medical freedom.

SOCIALIZED MEDICINE

(*Editorial in the Chicago Daily News, Aug. 2*)

The announced intention of the Department of Justice to bring suit against the American Medical Association under the anti-trust laws raises some interesting questions.

The department, according to the New Deal's new trust buster, Assistant Attorney General Thurman Arnold, thinks that the anti-trust laws apply to the offering of services as well as to the production of goods. That, if we are not mistaken, is a new interpretation. The line between offering one's services and offering one's labor is hard to draw. If Mr. Arnold can make this new interpretation stick, will there not be a conflict between the Wagner act, which favors collective bargaining in the offering of labor, and the anti-trust laws, which might then be twisted into a weapon against trade unionism?

Specifically, the federal government charges that the American Medical Association is conspiring to make group health plans impossible, by expelling from the asosciation doctors who join in such plans, and by forbidding its members to aid patients who subscribe to such plans. If it is true that the association does this, and does it in a spirit of opposition, not because it is seeking to maintain high ethical and technical standards in the profession, we think it is following a mistaken course. Mr. Arnold should produce the evidence.

But meanwhile, it is intimated that if the association will change its policy so as to encourage health plans in future, the government may drop its suit. Does this mean that the New Deal, in its continued mood of socialistic experiment, is bent now upon bringing about socialized medicine? If that is the real aim, the administration should say so plainly. Certainly the people are entitled to the best medical care that the science and devotion of the medical profession can provide. But is not the profession already giving such care? Every community has hospital arrangements for patients too poor to pay. Every conscientious physician and surgeon contributes some of his time without charge to the service of the poor, and does so quietly, as a matter of course. But we do not believe that the profession as a whole is in a mood to submit, even under pressure, to New Deal regimentation. And neither do we believe that the average American citizen is in a mood to let the government tell them, when he falls ill, which doctor he must have.

DEPARTMENT OF SOCIETY ACTIVITY

L. FERNALD FOSTER, M.D., Secretary

COME TO THE STATE MEETING

"YOUR physician will be away September 19, 20, 21, 22 taking postgraduate work in Detroit" is the message people will see in your local newspaper during September. This and additional advance publicity will educate the public to the value they will receive, *through you,* from the annual meeting of the Michigan State Medical Society.

As a progressive member of the medical profession, a leader in your community, you must merit the people's confidence in you by making every effort to take advantage of the unusual opportunities of your State Society convention.

A Rare Opportunity

The annual meeting of the Michigan State Medical Society offers:

1. An intensive and excellent postgraduate conference covering all branches of medicine, with
   (a) Seven General Assemblies (27 out-of-state lecturers)
   (b) Seven Section Meetings (25 speakers)
2. A full discussion of the socio-economic problems which face you in your practice (House of Delegates meeting).
3. Entertainment-golf-baseball-vacation features.
4. Symposium on "The Business Side of Medicine."
5. Good Fellowship—meeting old friends and making new ones.
6. An exhibit offering many new ideas and appliances to aid you in the successful practice of modern medicine.
7. A full program of entertainment for the ladies.

Your Good Fortune

A seven-ring circus? Yes,—in scientific medicine. A big show, designed, planned and conducted for *You,* Doctor. A round of activities welded together to give the physicians of Michigan a finer appreciation of their good fortune in being members of the greatest service profession in the world.

You are invited and urged, Doctor, to be one of the two thousand practitioners of medicine who will register in Detroit, September 19, 20, 21, 22, 1938. Accept our invitation, fulfill the trust of the people in your community so you may continue to be one of its leaders.

SECRETARIES' CONFERENCE

THE second Conference of County Secretaries for 1938 will be held Tuesday, September 20, at the time of the annual meeting in Detroit. Realizing that the county secretary is the key man of his local society, the conferences are designed to develop and sustain the inspiration which he must at all times demonstrate.

Every county secretary should attend the sessions of the annual meeting in order to become cognizant of the deliberations of the House of Delegates and to appreciate the developments in scientific medicine which will be presented in the general and section sessions.

The Secretaries' Conference as an integral part of the annual meeting will present a unique inspirational address by Dr. Williams Sadler of Chicago and will provide an opportunity for the interchange of ideas among the fifty-four secretaries, thereby aiding each society in the solution of its problems and of crystallizing the thought of the component units into a more consistent composite of the M.S.M.S.

Attendance at the Secretaries' Conference is both your opportunity and responsibility. Your County Society depends upon you, Dr. Secretary, as its pilot. Your efficiency cannot be developed and maintained unless you grasp each opportunity provided by the State Society—opportunities designed to aid your society both as a unit and its members as individuals.

Remember the date, Tuesday, September 20, at the Book-Cadillac Hotel, Detroit.

COUNTY MEDICAL SOCIETIES

THERE has never been a greater need for active, well-organized county medical societies. Officers and executive bodies of state medical societies should be able to devote their energies to the solution of current problems and be relieved of the responsibility of constantly urging county units to greater organizational efficiency.

Wherever problems of a socio-economic

or political complexion are difficult of solution, we usually find a poorly organized county medical society. Alert, aggressive societies are usually cognizant of what is transpiring in their territory and are able to develop constructive plans of solution and are asserting a real leadership in progressive movements and likewise are preventing the establishment of undesirable policies.

Only recently, a county medical society in Michigan found itself facing a situation which, if allowed to develop, would have seriously affected the practice of practically every doctor in the community. Energetic action, by the State society and members of the county society, tended to forestall the undesirable project. The movement might, by an active county medical society, have been stopped before it had assumed even such alarming proportions.

Let us develop each county society into an active component and be prepared, at all times, to defend the traditions of the American type of medical practice.

POLITICAL ECONOMY

Dae ye ken th' widow, Mistress Black,
Wha lives doon i' th' slums,
Th' slums that's doon there near th' track,
Amid th' factory lums.*

Weel, she's th' lass wha's man was kilt
An' left her bairnies five,
Noo that's enough tae mak one wilt
An' leave nae strength tae strive.

Bit she took washings an' some work
An' kept her brood of five,
An' fed them beans an' cheaper cuts
An' made them a' survive.

Noo, they've grown up an' through night school
An' love their mither fine,
They've helped tae keep her larder full,
Her face wi'oot a line.

Oh, maun, cud politicians noo
Learn frae this woman's skill,
They'd earn their bread wi' butter on't,
An' a' their promise fill.

Their studies in economy
Are costing more'n they earn,
An' going broke is irony
From which they dinna learn.

Bit hae them a' gang doon th' tracks
Tae switch light number three,
Turn left three doors tae Widow Black's
An' learn economy.

An' if they've no dumb heided men
They'll hae their lesson learned,
They'll ken tae live wi'in their plan
An' plan tae spend no more'n they've earned.

WEELUM

*lums—chimneys.

MICHIGAN'S DEPARTMENT OF HEALTH

DON W. GUDAKUNST, M.D., Commissioner
LANSING, MICHIGAN

PNEUMONIA SERUM TO BE DISTRIBUTED

The Michigan Department of Health, following three years of study in checking the effectiveness and improving the potency of pneumonia serum, is now prepared to distribute serum for Types I and II pneumonia to physicians throughout the state.

Nine serum distributing stations are already in operation at Detroit, Muskegon, Grand Haven, Grand Rapids, Lansing, Saginaw, Pontiac, Houghton and Marquette. Typing facilities are also available in thirteen other counties in lower Michigan. Distributing stations will be established in these counties as soon as local arrangements can be made.

To obtain state serum, physicians will be expected to have the type of pneumonia determined by a registered laboratory. A special form has been set up for the use of these typing stations, this form when properly filled out becoming both an order and a receipt for serum from the distributing stations if Type I or II serum is indicated.

At the time the serum is given out, the distributing station also provides the physician with the case report form. Physicians will be expected to complete and return these forms in the addressed envelope provided within thirty days of the onset of the illness.

There are approximately 74 pneumonia typing stations available at present. With the exception of the two stations at Houghton and Marquette, however, all of these are located below the Muskegon-Bay City line. Efforts are now being made by the Bureau of Laboratories, which is charged with the registration of laboratories in Michigan, to remedy this situation. A branch laboratory is being established at Powers in the Upper Peninsula to serve the southern and eastern communities in that area. Similar efforts are being made to develop typing facilities in the northern part of the Lower Peninsula. It is expected that adequate typing facilities will be available throughout the state before the advent of the pneumonia season this fall.

The Department is actively coöperating with the Subcommittee on Pneumonia of the Michigan State Medical Society's Preventive Medicine Committee. Through this committee, the pneumonia program will be given considerable attention in the Society's activities this fall with the provision of qualified speakers on pneumonia therapy. Arrangements are also being made to provide similar speakers on the postgraduate courses sponsored by the Society and the University of Michigan. The Joint Committee on Health Education has also agreed to cooperate in the lay health education program on pneumonia.

The county, district and municipal health officers will also take an active part in the development of the pneumonia program in their respective jurisdictions. In addition to arranging for the distribution of serum and the collection of reports, they will aid in the lay and professional education program.

* * *

BUREAU OF PUBLIC HEALTH NURSING CREATED

A Bureau of Public Health Nursing will be organized September 1 as one of the administrative divisions of the Michigan Department of Health, it

(Continued on page 838)



NursRite

NEW SCIENTIFIC DEVELOPMENT

Developed by a group of pediatricians through extended tests in difficult feeding cases, the NursRite Nipple has proved correct in principle and embodies many important advantages. Samples on request.

THE CILOCON CORPORATION
415 Francis Palms Bldg. Detroit, Mich.

Physicians pronounce this new nipple an unqualified success. The patented air valve regulates the flow of milk through control of the vacuum—nearest approach to nature. Used extensively by leading hospitals. On sale through drug and department stores.



The ONLY valve principle nipple that is 100% successful.



Since 1869

A PURE HEALTHFUL MINERAL WATER

• Since its discovery in 1869 "Natural Ray" mineral water from the famous Magnetic spring at St. Louis, Michigan, has won authentic endorsement. Pure and healthful, it is one of the few American alkaline mineral waters considered worthy of mention in the Encyclopedia Britannica.

The modern physician will recognize in this unusually palatable and delicious water a normal way to eliminate waste. He will find the calcium, sodium and magnesium content correctly proportioned.

Natural Ray is very reasonably priced and is available from Distributors located in the principal cities throughout Michigan. It is bottled at the spring in 2 quart, sterile, green glass containers and in 5 gallon bottles.

Physicians are invited to write for descriptive literature and certified analyses.

Michigan Magnetic Mineral Water Co.

St. Louis Michigan

has been announced by Dr. Don W. Gudakunst, commissioner.

The new bureau will be under the direction of Miss Helen Bean, who has been given a leave of absence from her present position as public health nursing consultant with the U. S. Public Health Service at Washington. All of the general nursing activities of the Department, including the supervision of county nursing programs, will be correlated under the new bureau. Nurses will be assigned by this bureau to assist in special projects conducted by other administrative divisions.

Heretofore, the Bureau of Maternal and Child Health has supervised the Department's public health nursing program. Child care class nurses and the field physicians and women's class organizers will be retained under the Bureau of Maternal and Child Health. The new bureau will be financed with the aid of maternal and child health funds granted to Michigan under the social security act.

* * *

RABIES COMMITTEE APPOINTED

An unusually extensive outbreak of rabies throughout the state which has already resulted in two deaths has brought joint action from the Michigan Department of Health, the Department of Agriculture and the Attorney General's Department. Prime objective of the attack will be control of the stray dog through stricter control of quarantine.

It has been estimated that 5,000 children have been bitten by dogs this year. The prevalence of the disease is indicated in that more than 45 per cent of the dogs examined at the Department of Health laboratories recently have been infected with rabies. Rabies vaccine for the treatment of 5,500 persons has been prepared and distributed by the Department laboratories this year at a cost of approximately $15,000.

A joint Committee on the Control of Rabies in Michigan has been appointed to seek ways and means of curbing the present outbreak of rabies and preventing future outbreaks. Members of this committee include Assistant Attorney General John F. Young; Dr. Filip C. Forsbeck, director of the Bureau of Epidemiology of the Michigan Department of Health; Dr. Herbert W. Emerson, director of the Pasteur Institute, Ann Arbor; Dr. C. H. Clark, State veterinarian; and Dr. Joseph A. Kasper, director of the Detroit Health Department laboratories.

At its meeting July 22, the committee adopted a unanimous resolution to the effect that responsibility for the enforcement of dog quarantines rests upon the law-enforcement agencies of the local community and called upon these agencies to make such quarantines effective. Dog quarantines, according to law, may be issued by the State Veterinarian upon the request of local officials, but once the quarantine is laid its enforcement is entirely in the hands of the local community. The committee agreed that there is no way provided for the Department of Agriculture to issue permits for transportation of dogs outside of quarantined areas. Local officials issuing such permits do so on their own responsibility.

Although cases of rabies in humans are now reportable to the Michigan Department of Health, there is no way to determine just how many persons have been bitten. The committee recommended to the State Health Commissioner and the State Council of Health that all cases of human beings who have been bitten by dogs be made immediately reportable to the Michigan Department of Health.

The committee is now studying the need for revision of existing quarantine laws and is drawing up recommendations regarding methods for the treatment of rabies in humans. An active public

(Continued on page 840)

ACCEPTED AMERICAN MEDICAL ASSN.

SMITH, KLINE & FRENCH LABORATORIES

announce that

BENZEDRINE SULFATE TABLETS

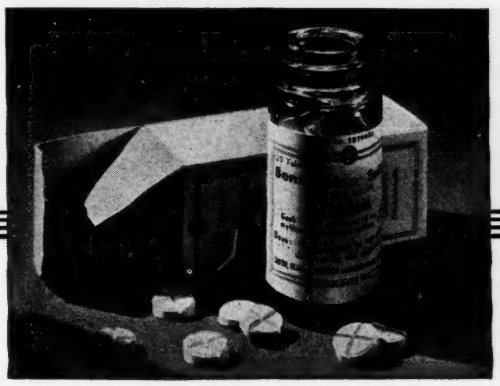
have been accepted

by

The Council on Pharmacy and Chemistry

of the American Medical Association

The announcement of acceptance appeared in the July 2nd issue of the J. A. M. A.



Each 'Benzedrine Sulfate Tablet' contains amphetamine sulfate, 10 mg. (approximately 1/6 gr.)

The Council on Pharmacy and Chemistry of the A. M. A. has adopted amphetamine as the descriptive name for α-methylphenethylamine, the substance formerly known as benzyl methyl carbinamine. 'Benzedrine' is S. K. F.'s trademark for their brand of amphetamine.

SMITH, KLINE & FRENCH LABORATORIES, PHILADELPHIA, PA.

Established 1841



CO-ORDINATION

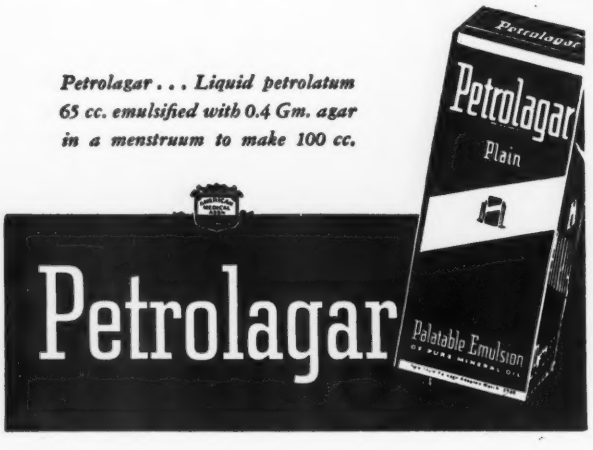
When the success of a plan depends upon its perfect execution there must be strict co-ordination between the individuals involved.

No program of treatment can relieve the incidence of constipation unless the patient is willing to co-ordinate his efforts with those of the physician. That is why so many doctors prescribe Petrolagar for their patients. Its pleasant taste and gentle, consistent-action are acceptable to the patient as well as to the physician.

Five types of Petrolagar provide a choice of medication to suit the individual case. Samples on request.

Petrolagar Laboratories, Inc. • Chicago, Ill.

Petrolagar . . . Liquid petrolatum 65 cc. emulsified with 0.4 Gm. agar in a menstruum to make 100 cc.



education program is being sponsored to acquaint laymen with preventive measures for the protection of dogs as well as human beings.

* * *

COMMUNICABLE DISEASE MORBIDITY AND MORTALITY

Most prevalent communicable disease during the first five months of 1938 has been measles as was predicted early in the year. A total of 67,137 cases has already been reported, closely approaching the last epidemic year in 1935 when 79,061 cases were reported for the entire year. The peak was reached in March this year when 22,135 cases occurred. April cases declined to 17,574 and May to 13,892.

Scarlet fever was the second most prevalent communicable disease during this period, a total of 11,016 cases being reported. Whooping cough cases totaled 5,165. There were 170 cases of smallpox, 241 cases of diphtheria, 108 cases of typhoid fever, 63 cases of undulant fever, 34 cases of meningitis and nine cases of poliomyelitis during the five months ending May 31.

Mortality from measles during the first four months of the year accounted for 63 deaths. There were 49 deaths from scarlet fever. Whooping cough caused 26 deaths; diphtheria, 17 deaths; erysipelas, 14 deaths; typhoid fever, 11 deaths; and poliomyelitis, one death.

* * *

VITAL STATISTICS FOR 1937

Official vital statistics for Michigan in 1937 released recently by the Bureau of Records and Statistics indicate a state mortality rate of 10.50 deaths per 1,000 population. The rate in 1936 was 10.78. A total of 53,468 deaths were reported in 1937 compared with 54,777 the previous year. All rates are determined upon a population estimate of 5,093,000 in 1937.

For the fourth consecutive year a slight increase is recorded in the birth rate. There were 91,566 births in 1937 with a birth rate of 17.98 per 1,000 population, the highest since 1931. This was an increase of 3,109 births over the 1936 total.

The infant mortality rate in 1937 was the lowest ever recorded in Michigan with the exception of 1935. There were 4,374 deaths of infants under one year of age with a rate of 47.77 deaths per 1,000 live births. The 1936 rate was 50.63 when 4,479 infant deaths were reported.

A new low maternal mortality rate was established in 1937. There were 326 deaths of mothers from causes connected with pregnancy and childbirth, a maternal mortality rate of 3.56 per 1,000 live births. This is a 25 per cent decrease from the 1936 rate of 4.80 when 425 maternal deaths were reported.

The greatest number of marriages since 1924 was reported last year in Michigan. There were 47,954 marriages compared to 47,023 in 1936 and 28,552 in the low year of 1932. Divorces, too, increased to 12,472, the largest number ever reported in a single year. The highest number of divorces previously reported was in 1929 when 12,094 were granted. There is an average of one divorce to four marriages in Michigan.

* * *

PRINCIPAL CAUSES OF DEATH IN 1937

Ten principal causes of death accounted for 70 per cent of the total mortality in Michigan in 1937. Of the total of 53,468 deaths, 37,477 were the combined toll of heart disease, cancer, apoplexy, pneumonia, coronary disease and angina, nephritis, accidents exclusive of automobile, automobile accidents, tuberculosis and diabetes.

Heart disease caused 9,726 deaths last year, a mortality rate of 190.97 per 100,000 population. This

A Desirable Location — —

PROFESSIONAL men agree that the Stroh Building is a desirable location. It offers modern, comfortable facilities for their patients in a building where high standards, convenience and prestige have kept pace with medicine and science.



New air-conditioned, quota-controlled, elevators have recently been installed. They represent the ultimate of perfection in present day vertical transportation systems.

Reasonable Rentals

STROH BUILDING

Facing Grand Circus Park

28 West Adams Avenue **Randolph 8968**

Detroit, Michigan

was the largest decrease in mortality from this cause in recent years. The 1936 rate was 197.04 when 10,010 deaths occurred.

Cancer, too, was marked by the first decrease in mortality for some time. Cancer accounted for 5,528 deaths compared with 5,543 in 1936. The mortality rates are 108.54 for 1937 and 109.11 for 1936.

Apoplexy replaced pneumonia as the third major cause of death in 1937. There were 4,195 deaths from apoplexy with a mortality rate of 82.37. In 1936, there were 4,529 deaths and a rate of 89.15.

Pneumonia mortality was practically stationary with 4,098 deaths last year compared to 4,096 deaths in 1936. The 1937 mortality rate for this disease was 80.46 per 100,000 population.

Coronary disease and angina as the fifth major cause of death accounted for a mortality of 3,045. The rate was 59.79 deaths per 100,000 population.

Nephritis mortality in 1937 was the lowest in the past ten years. There were 2,931 deaths due to this cause compared to 3,033 in 1936. The comparative mortality rates were 57.55 in 1937 and 59.70 in 1936.

Accidental deaths, excluding those caused by automobiles, were in seventh place with a toll of 2,405 lives. The rate for such deaths was 47.22 per 100,000 population. Automobile deaths alone occupied eighth place. There were 2,175 automobile deaths making the all-time high record for this cause. The rate for 1937 was 42.71.

Tuberculosis, the ninth major cause of death, again failed to decline in 1937, continuing the slight increase first indicated in 1936. There were 2,119 deaths from this cause in 1937 with a rate of 41.61 compared to 2,100 deaths and a rate of 41.34 in 1936. The lowest tuberculosis death rate of 40.24 was established in 1935.

Diabetes in tenth place accounted for 1,255 deaths, a rate of 24.64 deaths per 100,000. This is a slight decline from the 2,266 deaths and the rate of 24.92 in 1936 but it is considerably higher than the mortality experienced previous to 1934.

* * *

OBSTETRICAL CONSULTANT SERVICE

A field consultant service in obstetrics has been inaugurated by the Bureau of Maternal and Child Health for the physicians of Michigan. Dr. Clair Folsome, who has been senior instructor in the Department of Obstetrics and Gynecology at the University of Michigan for the past five years, has been appointed to take charge of this program.

Dr. Folsome will carry on his activities in conjunction with the maternal health committees of the county and district medical societies. His services are freely available to all physicians, but at no time will he replace physicians who usually assist at deliveries.

The obstetrical consultant service may be obtained by any local medical society upon request. Dr. Folsome's schedule allows him to spend a week in each area. During July and August his services were available in Manistee, Wexford, Grand Traverse, Mecosta, Genesee and Crawford counties.

* * *

POSTGRADUATE OBSTETRICAL TRAINING

Dr. Sprague H. Gardiner, senior instructor in the Department of Obstetrics and Gynecoloy, University of Michigan, has been assigned to the staff of the Michigan Department of Health to direct the short course of postgraduate instruction in obstetrics and gynecology being sponsored by the Bureau of Maternal and Child Health. Dr. Gardiner will serve under the direction of Dr. Norman F. Miller, head of the Department of Obstetrics and Gynecology.

The postgraduate course provides for two weeks of intensive training and observation in obstetrics, gynecology and allied subjects at University Hospital. Two practicing physicians are appointed for each period.

Appointees for the quarter beginning Oct. 1 include Dr. William Winter, Holland; Dr. Marvin Meengs, Muskegon Heights; Dr. N. H. Clark, Holland; Dr. H. C. Irvin, Holland; Dr. W. R. Lyman, Dowagiac; Dr. George Loupee, Dowagiac; Dr. Clayton H. Palmer, Cassopolis; Dr. Saba Kessler, Bay City; Dr. G. D. Bos, Holland; and Dr. O. D. Stryker, Fremont.

* * *

POSTGRADUATE EDUCATION IN CHILDREN'S DENTISTRY

The Michigan Department of Health in coöperation with the Postgraduate Division of the University of Michigan School of Dentistry and the Michigan State Dental Society is offering a series of postgraduate seminars in children's dentistry at seven Michigan cities starting the week of September 13.

The course will be given on three days at each center with Dr. Kenneth A. Easlick, professor of children's dentistry at Ann Arbor, Dr. Walter C. McBride of Detroit and Dr. C. W. Wilson of Detroit as special lecturers and clinicians. Centers where the course will be presented include Port Huron, Saginaw, Alpena, Lansing, Grand Rapids, Kalamazoo and Jackson.

* * *

FELLOWSHIPS IN HEALTH EDUCATION

Six fellowships for training in public health education will be offered instructors in Michigan colleges as a part of the Michigan Department of Health's program for improving the health education of teachers. The fellowships will enable instructors at Wayne University, Michigan State College and the teachers' colleges to receive a year's training in public health. The instructors will then return to their institutions to conduct health education courses for students who are preparing to become school teachers.

* * *

CASS COUNTY MATERNITY NURSING SERVICE

The staff of the Cass County Maternity Nursing Service have attended 62 home deliveries during the six months that this demonstration project has been conducted by the Michigan Department of Health. There have been 182 prenatal cases admitted to nursing service and 152 postnatal cases during this period.

Miss Harriet Hird is the supervising nurse in charge of the Cass County project assisted by Miss Fern Welsh and Miss Kathryn McCormick. In addition to the home deliveries attended with local physicians, the nurses have made 230 postpartum bedside calls. The staff has also conducted an infant and preschool hygiene program for a total of 302 cases during the six months ending June 30.

In the future in this county the stork may arrive to the accompaniment of a representative of the law. The county sheriff's department has agreed to send a deputy to accompany the nurses on all night delivery calls.

* * *

WOMEN'S HEALTH CLASSES POPULAR

An increasing interest in popular health instruction is indicated in one of the largest enrollments ever attained in the women's health classes conduced by the Bureau of Maternal and Child Health during the past year. A total of 8,256 mothers and prospective mothers in 13 Michigan counties enrolled

(Continued on page 844)

When in need of UNUSUAL

• AMPOULES

• BIOLOGICALS

• LABORATORY SUPPLIES

Call:

R. L. McCabe

PRESCRIPTIONIST

8700 Grand River Avenue, Corner Arcadia

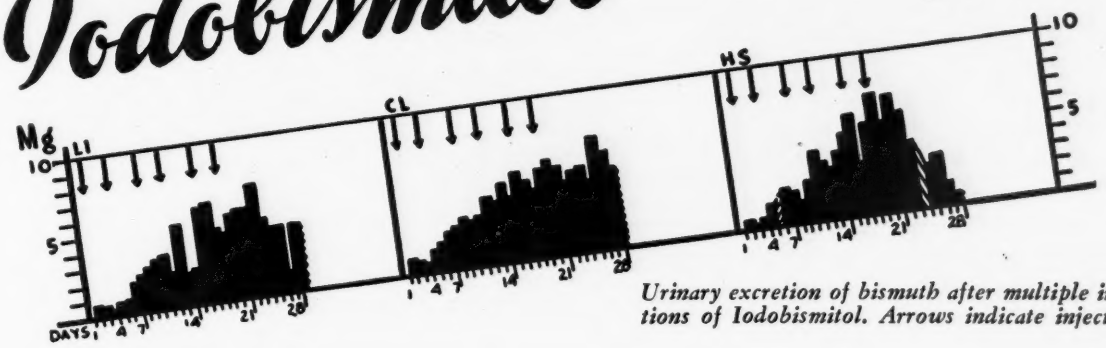
DETROIT - TYler 4-3500

Prompt, Motorized Delivery Service



FOR SUSTAINED BISMUTH EFFECT USE

Iodobismitol with Saligenin



Urinary excretion of bismuth after multiple injections of Iodobismitol. Arrows indicate injections

ACCORDING to the Council on Pharmacy and Chemistry—"Probably those compounds of bismuth will have the best spirocheticidal effect that are able to keep the therapeutic level of bismuth at such a continuous height that it will be reflected in the urine with a level of 0.002 Gm. or more of metallic bismuth per day."

That Iodobismitol with Saligenin meets this requirement was shown by a recent clinical study.[1] Two-cc. doses of Iodobismitol with Saligenin were given twice weekly for three weeks. The charts illustrated above show the urinary excretion over a period of four weeks—49% of the bismuth having been excreted. Iodobismitol with Saligenin was the only preparation so studied capable of maintaining a therapeutically active concentration of bismuth in the blood stream as manifested by a constant urinary excretion equivalent to or in excess of 0.002 Gm. daily.

Iodobismitol with Saligenin may be used alone or with the arsenicals in both early and late syphilis. It presents bismuth largely in anionic (electro-negative) form. It is a propylene glycol solution containing 6% sodium iodobismuthite, 12% sodium iodide, and 4% saligenin (a local anesthetic).

SQUIBB ARSENICALS

Neoarsphenamine Squibb, Arsphenamine Squibb, and Sulpharsphenamine Squibb are prepared to produce maximum therapeutic benefit. They are subjected to exacting controls to assure a high margin of safety, uniform strength, ready solubility, and high spirocheticidal activity.

For literature write to Professional Service Dept., 745 Fifth Ave., New York

[1] Sollmann, T., Cole, H. N., Henderson, K., *et al.: Amer. J. Syph., Gon. & Ven. Dis.* 21:480 (Sept.), 1937.

E·R·SQUIBB & SONS, NEW YORK

MANUFACTURING CHEMISTS TO THE MEDICAL PROFESSION SINCE 1858

for the series of classes conducted by Dr. Berneta Block and Dr. Emily Ripka. An average of 60 women enrolled in each of the 136 classes.

Counties where lectures were given this year include Wexford, Grand Traverse, Charlevoix, Otsego, Leelanau, Cass, Lapeer, St. Joseph, Oakland, Huron, Manistee, Alcona and Alpena. Local medical societies gave their approval and coöperation in the organization of the classes.

The six lectures given each class included illustrated discussions of first aid, our body and how it functions, the beginning of life and the care of the woman during pregnancy and following delivery, the care and training of young children, preventing communicable diseases, and the challenge of cancer.

Starting in September, the classes will again be sponsored in various counties throughout the state.

* * *

PERSONNEL

Dr. W. J. V. Deacon, director of the Bureau of Records and Statistics, Michigan Department of Health, has been appointed by Secretary of State Cordell Hull as one of the nine delegates from the United States to attend the meeting of the International Commission for the Decennial Revision of the International Nomenclature of Diseases to be held at Paris, France, beginning October 3, 1938.

Dr. Philip E. Bourland has recently joined the staff of the Bureau of Epidemiology where he will assist Dr. Filip Forsbeck, director, as field epidemiologist. Dr. Bourland is a graduate of the University of Michigan School of Medicine, serving at University Hospital and Blodgett Memorial Hospital, Grand Rapids. His home is at Calumet, Michigan.

Dr. George C. Stucky, former director of the Ingham County Tuberculosis Hospital, becomes director of the Eaton County Health Department on September 1. Dr. Stucky graduated from the University of Michigan School of Medicine in 1923 and served for a time with the Michigan Department of Health before entering tuberculosis work in Ingham County.

The Hand-Shakers—In the course of a duel in France, the parties discharged their pistols without effect, whereupon one of the seconds proposed that the combatants should shake hands. To this the other second objected.

"It is quite unnecessary," said he. "Their hands have been shaking for half an hour.

—*Arrow.*

* * *

Impedimented Speech—It is said that people who stammer often sing well. A deck hand who suffered from an impediment in his speech ran to the captain on the bridge during a storm and started "P-p-please, s-s-sir."

"For goodness sake hurry up," said the captain irritably. "If you can't say it, sing it."

The deck hand took a very long breath and sang—"Should auld acquaintance be forgot and never brought to mind, the first mate's fallen overboard, he's half a mile behind."—Montreal *Star.*

INTERNATIONAL MEDICAL ASSEMBLY

Inter-State Postgraduate Medical Association of North America

Public Auditorium, Philadelphia, Pa. OCTOBER 31, NOVEMBER 1, 2, 3, 4, 1938

Pre-assembly clinics, October 29; Post-assembly clinics, November 5, Philadelphia hospitals
President, Dr. Elliott P. Joslin; President-Elect, Dr. George W. Crile
Chairman, Program Committee, Dr. George W. Crile; Managing-Director, Dr. William B. Peck
Secretary, Dr. Tom B. Throckmorton; Director of Exhibits, Dr. Arthur G. Sullivan
Treasurer and Director Foundation Fund, Dr. Henry G. Langworthy
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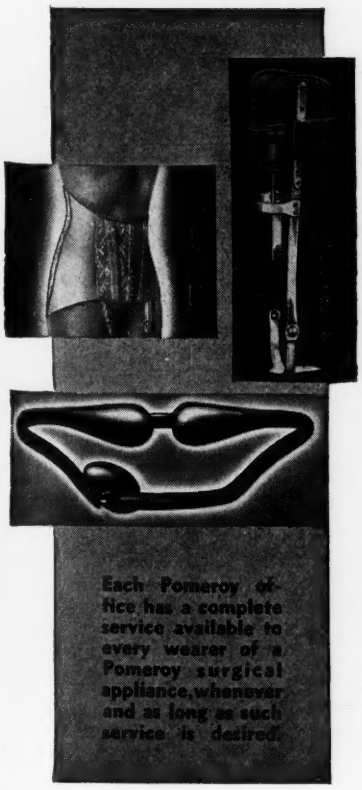
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COMMUNICATIONS

PRACTICE BY CORPORATIONS

Through the kindness of Dr. J. E. McIntyre of Lansing, Secretary of the Michigan State Board of Registration in Medicine, we are privileged to publish the following opinion from the office of the Attorney General of the state. This is particularly important as well as interesting at this time, when corporate practice of medicine appears to be in the offing.

State of Michigan
Office of the
ATTORNEY GENERAL
Lansing, Michigan
August 3, 1938

State Board of Registration in Medicine
100 West Allegan Street
Lansing, Michigan

Attention: Dr. J. E. McIntyre, Secretary.

Gentlemen:

We have your communication of July 15, requesting our opinion on the following matters:

"1. Is it illegal for a corporation to practice Medicine under Act 237, Public Acts of 1899, as amended?

"2. What is your interpretation of the last three lines of Section 3 of Act 237, Public Acts of 1899, as amended, which state: 'Provided that this section shall not apply to such forms of contract practice as are from time to time endorsed by this Board'?"

In answer to your first inquiry, it is our opinion that under the Michigan Medical Practice Act, being Act No. 237, Public Acts of 1899, as amended, it is not possible for a corporation to qualify so as to be entitled to practice medicine.

The question as to the right of a corporation to practice medicine has been considered by many courts, and the weight of authority is in accordance with the decision of the Supreme Court of the State of Illinois in the case of People of the State of Illinois v. United Medical Service, Inc., which is reported in 362 Ill. 442, 200 N. E. 157.

In that case the Illinois Supreme Court determined that a medical practice act forbidding the practice of medicine by unlicensed persons, making the passing of an examination a condition of the issuance of the license, and requiring that the applicant shall have attained the age of 21 years and be of good moral character and have certain educational qualifications, manifests a legislative intent that licenses shall be issued to individuals only, and not to corporations.

The Medical Practice Act of Michigan is similar in these respects to that of Illinois.

It is our opinion that under the Michigan Medical Practice Act a corporation cannot practice medicine. See also annotation in 103 American Law Reports, page 1240.

You further ask for our interpretation of the last three lines of Section 3 of Act No. 237, Public Acts of 1899, as amended, which state: "Provided that this section shall not apply to such forms of contract practice as are from time to time endorsed by this board."

No definition of what constitutes contract practice is contained in the act; but in the medical profession it is commonly understood to mean that practice by which physicians undertake to treat a group of persons as, for instance, the employees of an industrial concern, in return for a fixed compensation received from the owner or operator of the concern.

It is our opinion that this provision was meant to be considered in connection with the various subdivisions of Subsection 6 of said Section 3, which state the various grounds on which the Board may refuse to issue or revoke a certificate of medical registration, and was particularly intended to be construed in connection with subdivision (h) of said subsection, which provides in part that the State Board of Registration in Medicine may refuse to issue or continue a certificate if a person employs or is employed by any capper, solicitor or drummer for the purpose of securing patients.

We trust that the foregoing answer the questions contained in your letter.

Very truly yours,
RAYMOND W STARR,
Attorney General.
By SAMUEL B. OSTROW,
Attorney General Chief Assistant.

AGL:av

MATERNAL HEALTH OF MICHIGAN

THE JOURNAL has received the following communication from Dr. Alexander M. Campbell, Chairman of the Committee on Maternal Health of the Michigan State Medical Society. We give below a list of officers of the various Maternal Health Committees of the county medical societies of the state. The state committee suggests the following activities for the county medical society committees:

1. Assume practical interest in all matters pertaining to Maternal Health in your own county and see that prospective mothers receive the necessary maternal care in an adequate and intelligent manner.
2. Stimulate your fellow members to a greater interest in obstetrical work.
3. Develop within your own Society speakers to discuss obstetrical subjects and arrange through the Program Committee to import outside speakers to address the Society on obstetrical problems at least twice a year.
4. Arrange to have women's clubs and other groups of women addressed on obstetrics by either local or other physicians.
5. Investigate the mortality and morbidity associated with obstetrical work in your own county.
6. Endeavor to educate all expectant mothers in the county to place themselves under obstetrical supervision just as soon as the condition of pregnancy is suspected.
7. Encourage all parous women to submit themselves to proper postnatal care and periodical pelvic examinations following the birth of each child.
8. Investigate the type of obstetrical service rendered by physicians in your county who are not members of the Medical Society.

ALEXANDER M. CAMPBELL, M.D.
Chairman, Committee on Maternal Health, Michigan State Medical Society

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General News and Announcements

A conference on rural medicine will be held at the Mary Imogene Bassett Hospital, Cooperstown, N. Y., on October 7-8, 1938.

* * *

The A.M.A. has prepared a booklet on "Group Hospitalization Insurance," which is available upon request. Write 535 No. Dearborn Street, Chicago.

* * *

Wm. M. German, M.D., Pathologist and Director of Laboratories at Blodgett Hospital, Grand Rapids, since 1932, has accepted a position as pathologist in the Good Samaritan Hospital in Cincinnati.

* * *

F. C. Warnshuis, M.D., announces his removal to Boston, where he is permanently located at 137 Newberry Street, as President and Editor-in-chief of the American Medico-Legal Association.

* * *

The Basic Science Board met in the Governor's office in Lansing on Tuesday, August 2, and organized. Ralph C. Huston, Ph.D., of Michigan State College, East Lansing, was chosen as President of the Board.

* * *

A summer outing was held by the Muskegon County Medical Society at the Old Channel Trail Golf Course on Wednesday, August 10. Golf, swimming, baseball, refreshments, and dinner were enjoyed.

* * *

The House of Delegates of the Michigan State Medical Society will convene on Monday, September 19, 1938, at 9:00 a. m.

All members of the State Society are welcome and are urged to attend this most important meeting.

* * *

Hotel reservations should be obtained early, if you are planning to attend the 1938 Detroit convention of the Michigan State Medical Society. A registration of 2,000 physicians is expected.

Remember the dates: September 20, 21, 22, 1938; the place: Book-Cadillac Hotel, Detroit.

* * *

"Save an order for the M.S.M.S. advertiser and exhibitor" is a slogan that should be heeded by the 4,000 members of the State Society. These friends help to maintain two important features of the State Society—the Annual Meeting, and THE JOURNAL.

* * *

The American Association of Railway Surgeons will hold its 23rd annual meeting at the Palmer House, Chicago, September 19 to 23. All members of the M.S.M.S. are invited to attend this meeting. The program may be obtained by writing A. G. Park, A.A.R.S., Palmer House, Chicago.

* * *

A "Preventive Medicine Reunion" will be held at the Book-Cadillac Hotel, Detroit, September 21, 1938, with a luncheon. All those members of the Preventive Medicine Committee during former years are especially invited and urged to attend this luncheon. All others who are interested in preventive medicine are cordially invited to attend.

The speaker will be John Gordon, M.D., of Boston, who has recently spent considerable time in

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Roumania. His subject will be "Highlights of Rural Roumanian Medicine." Plan now to attend this outstanding attraction.

* * *

Clare Gates, Dr. P. H., who has been acting as Field Secretary for the Joint Committee on Health Education for several years, recently resigned to accept a position as Director of Public Health Education for the North Dakota Department of Health, Bismarck. Congratulations, Dr. Gates, and full success in your new work.

* * *

The Attorney General of Michigan has requested the Michigan State Medical Society, through the State Board of Registration in Medicine, to develop an article dealing with the evils of marihuana, both mentally and physically, upon human beings.

The invitation of the Attorney General has been accepted by the State Society.

* * *

The Northern Michigan Medical Society was host at a "State Society Night" on July 21, in Petoskey. Talks were given by M.S.M.S. President Henry Cook, Council Chairman P. R. Urmston, Councilor I. W. Greene and Secretary L. Fernald Foster, Councilor B. H. VanLeuven, of Petoskey, presided as President of the Northern Michigan Medical Society.

* * *

County societies are urged to prepare statements and statistics which may be presented by them to supervisors and county poor commissioners in the various counties, to prove that Preventive Medical Procedures, by the early treatment of syphilis, tuberculosis, mental hygiene, et cetera, will save money in the long run by cutting down long-time institutional care.

* * *

A Bureau of Information will be maintained at the Registration Desk, 4th Floor, Book-Cadillac Hotel, Detroit, on the occasion of the M.S.M.S. Annual Meeting.

Physicians expecting to receive telephone calls should leave the proper information with the hotel operator, so that calls may be relayed by the operator to the Bureau of Information, if necessary.

* * *

Parking: Special rates for parking for members attending the Detroit meeting of the M.S.M.S. have been arranged as follows:

Two Units of the Detroit Garages, Inc., one at Cass and Lafayette, and the north unit at Clifford and Elizabeth, will provide rates as follows:

2 hours—25c	24 hours—$1.00
4 hours—35c	3 days—$2.00
10 hours—50c	4 days—$2.50
18 hours—75c	

* * *

The Second Annual Symposium on Occupational Diseases of the Department of Industrial Medicine of the Northwestern University Medical School will be held on September 26 and 27, 1938, at Thorne Hall on the Chicago Campus.

The program will include papers on industrial disease education, the scope of the occupational disease research problem, traumatic neurosis, the health of the worker in the shop and at home, industrial plant surveys, industrial health and the practicing physician, cardiovascular disease and peripheral vascular disease in the middle aged group of industrial workers.

At a final evening banquet session the subjects will be the responsibility of labor, management, and the community and morbidity and mortality statistics.

* * *

Dr. Carlton B. Pierce, Associate Professor of Roentgenology of the University of Michigan Medical School, has resigned to become director of the Department of Radiology at the Royal Victoria



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Hospital, Montreal, where he will also be associated with the faculty of the Medical School of McGill University. Dr. Pierce was a member of the Detroit Roentgen Ray Society, and also the Michigan Association of Roentgenologists.

* * *

November 8, 1938, is General Election Day. No more important day in the life of a physician can be registered—especially this year, and in view of the momentous and serious problems which are being thrown out from the national capitol.

Vote on Election Day for friends of Medicine. See that your wife and members of your family vote. Urge your patients to vote for U. S. Congressmen and State Senators and Representatives who will insure them a high quality of medical service.

* * *

Dr. Wm. M. Donald of 938 David Whitney Bldg., Detroit, is compiling a short history of the Northern Tri-State Medical Association, now almost seventy years of age.

The founders and early officers of this hustling and aggressive organization seem to have been careless in preserving the official documents incident to the creation and development of such a society, and, hence, the historian's task is a heavy one.

Any information relative to the Society above mentioned during the period between 1870 and 1885 will be highly appreciated by Dr. Donald.

* * *

The M.S.M.S. Maternal Health Committee announces a get-together luncheon on Wednesday, September 21, in the Book-Cadillac Hotel, Detroit, at 12:30 p. m., for all members, past and present, of the State Society's and of county societies' Maternal Health Committees.

Joseph L. Baer, M.D., of Chicago, Clinical Professor, Department of Gynecology and Obstetrics at Rush Medical College, a fluent speaker, of international reputation, will address the group on "The Opportunities and Responsibilities of Committees on Maternal Health of County Medical Societies."

* * *

The Michigan Branch of the American Medical Women's Association will hold their annual meeting, which will be both Scientific and Social, September 19 to 22 in conjunction with the Michigan State Medical Society.

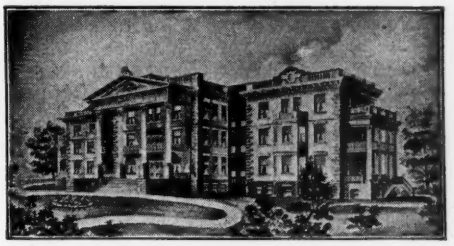
Among those taking part in the Program are Dr. Mary Margaret Frazer, president of the Michigan Branch and vice president of the National A.M.W.A., who will give a résumé of the meeting held in San Francisco in June, and Dr. Bertha Van Hoosen of Chicago, former president of the National Association, who will give a talk and moving picture on a gynecological subject. The Blackwell Medical Society, through its president, Dr. Francis Ford, has arranged a dinner honoring the State Medical Women. The members of the A.M.W.A. will be notified later of a completed program. All medical women of Michigan are invited to attend this meeting. Please notify Dr. Thelma Wygant, 651 Fisher Building, Detroit, or Dr. Mary Margaret Frazer, President, 76 W. Adams Avenue, Detroit.

* * *

Crippled and Afflicted Child Commitments, for July, 1938:

Crippled Child: Total cases, 470, of which 172 went to University Hospital; 298 to miscellaneous hospitals. From Wayne County, of the above, 16 went to University Hospital; 80 to miscellaneous hospitals; total 96.

Afflicted Child: Total cases, 2,172, of which 331 went to University Hospital; 1,841 went to miscellaneous hospitals. From Wayne County, of the above, 34 went to University Hospital; 550 went to miscellaneous hospitals; total 584.



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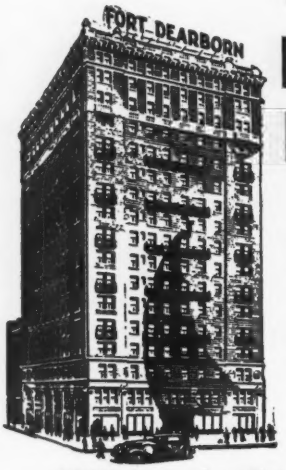
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Written examinations for certification by the American Board of Internal Medicine will be held in various parts of the United States on Monday October 17, 1938, and on Monday, February 20, 1939.

Formal application must be received by the Secretary before September 15, 1938, for the October, 1938, examination, and on or before January 1 for the February 1939 examination.

Application forms may be obtained from William S. Middleton, M.D., Secretary-Treasurer, 1301 University Avenue, Madison, Wisconsin.

* * *

Interstate Postgraduate Medical Association

The International Assembly of the Interstate Postgraduate Medical Association of North America will be held in the Public Auditorium of Philadelphia, Pennsylvania, October 31, November 1, 2, 3 and 4. Pre-assembly and post-assembly clinics will be conducted in the Philadelphia hospitals the Saturdays previous and following the Assembly.

It is the aim of the International Assemblies to present to the profession the approved advancement of medical science and research, not unmindful of the practical side of medical study. To this end, diagnostic clinics, orations, symposia and discussions are offered by leading teachers and clinicians.

The high standing of the medical profession, combined with the usual clinical facilities of its great hospitals and excellent hotel accommodations, make Philadelphia an ideal city in which to hold the Assembly.

The Association through its officers and members of the program committee extends a very cordial invitation to all physicians in good standing in their State and Provincial Medical Societies to attend the Assembly. An unusual clinical and didactic program, including all branches of medicine and surgery and the specialties, has been arranged by the program committee.

The members of the profession are urged to bring their ladies with them as a very excellent program is being arranged for their benefit by the ladies' committee. Philadelphia has many places of historic and other interests, which will make this year's program especially attractive to them.

In coöperation with the Philadelphia County Medical Society, the College of Physicians of Philadelphia, and the Pennsylvania State Medical Society, and with the active support of the Philadelphia Chamber of Commerce and the Convention and Tourist Bureau, a most excellent opportunity for an intensive week of postgraduate medical instruction is offered by a very large group of acknowledged leaders in the profession.

With a great deal of pride and satisfaction, we call your attention to the list of distinguished teachers and clinicians who are to take part on the program and whose names appear on page 844 of the advertising section of this JOURNAL.

Registration fee of $5.00 admits all members of the profession in good standing.

Officers of the Association are:

Dr. Elliott P. Joslin, *President,* Boston, Mass.; Dr. George W. Crile, *Chairman Program Committee,* Cleveland, Ohio, and Dr. William B. Peck, *Managing-Director,* Freeport, Ill.

* * *

University of Michigan Medical Reunion

A reunion of the University of Michigan Medical School, and of the former staff members and internes of the University Hospital is to be held in

Ann Arbor on September 29 and 30 and October 1, 1938.

There will be a two-day scientific program in which the following will participate: Dr. Reuben Peterson, Professor Emeritus of Obstetrics and Gynecology: Landmarks in the History of the University of Michigan Medical School and Its Hospital; Dr. Cyrus C. Sturgis, Professor of Internal Medicine: A Résumé of Eleven Years' Experience in Hematology at the Simpson Memorial Institute; Dr. Donald D. Van Slyke, Rockefeller Institute for Medical Research, New York City: The Physiology of Renal Excretion; Dr. Norman F. Miller, Professor of Obstetrics and Gynecology: Common Lesions of the Cervix; Dr. Ward J. MacNeal, Professor of Pathology and Bacteriology, New Nork Postgraduate Medical School, Columbia University, New York City: Bacteriophages as Aids in Dealing with Infections; Dr. Carl E. Badgley, Professor of Surgery: A Study of the Causes and Methods of Prevention of Non-union of Fractures of the Shaft of the Long Bones; Dr. Walter Bauer, Associate Professor of Medicine, Harvard University Medical School, Boston: The Physiology of Normal Joints and its Relation to Joint Disease; Dr. Bradley M. Patten, Professor of Anatomy: The First Heart Beats and the Beginning of the Circulation of Blood as Shown by Micro-moving Pictures of Living Embryos; Dr. Carl V. Weller, Professor of Pathology: The Intrinsic Factor in the Etiology of Malignancy: Inheritance of Retinoblastoma; Dr. Joseph Brennemann, Professor of Pediatrics, The School of Medicine of the Division of Biological Sciences, University of Chicago: Abdominal Pain in Children; Dr. Hugo A. Greund, Professor of Clinical Medicine, Wayne University College of Medicine, Detroit: Renal Ischemia and Vascular Hypertension Associated with Coarctation of the Aorta. Case Reports; Dr. Max M. Peet, Professor of Surgery: Results of Splanchnicectomy for Hypertension.

Dr. Hugh Cabot, former Dean of the Medical School, Professor of Surgery at the University of Minnesota Graduate School of Medicine, The Mayo Foundation, Rochester, Minnesota: Intravenous Urography: Its Place in General Medical and Surgical Diagnosis; Dr. Francis E. Senear, Professor of Dermatology, University of Illinois College of Medicine, Chicago: The Serologic Diagnosis of Syphilis; Dr. Frederick A. Coller, Professor of Surgery: Physiology and Chemistry in Surgery; Dr. Frank N. Wilson, Professor of Internal Medicine: The Differential Diagnosis of Coronary Occlusion; Dr. Charles W. Edmunds, Professor of Materia Medica and Therapeutics: The Problem of Drug Addiction; Dr. Warren T. Vaughan, Richmond, Virginia: Tissue Tension Studies in Clinical Allergy and Experimental Anaphylaxis; Dr. James B. Herrick, Professor Emeritus of Medicine, Rush Medical College, University of Chicago: Acute Endocarditis; Dr. Louis H. Newburgh, Professor of Clinical Investigation in the Department of Internal Medicine: A New Interpretation of Diabetes Mellitus in Middle-aged Obese Persons; Dr. Perrin H. Long, Associate Professor of Medicine, Johns Hopkins University Medical School, Baltimore, Maryland: Further Observations upon the Experimental and Clinical Use of Sulfanilamide; Dr. Frederic M. Loomis, Oakland, California: The Third Component: The Relationship between Them; Dr. H. Winnett Orr, Lincoln, Nebraska: Methods for the Prevention and Cure of Septicemia following Injuries and Surgical Operations; Dr. Udo J. Wile, Professor of Dermatology and Syphilology: Sex Hormone Studies in Acne. The Urinary Excretion of Androgenic and Estrogenic Substances. Clinic on Lymphoblastomas.

In addition to these clinical talks, there is to be

To My Friends
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As the Gastro-Photor (Stomach Camera) is now taking most of my efforts in its National Distribution and Sales, I do not have the time for the treasured personal contacts with you that I formerly enjoyed. However, I wish to utilize this space to sincerely thank all of you who have been so marvelously good to me in the past.

If you were in San Francisco at the National Meeting I am sure that you stopped to say "hello." However, if you were not in attendance be sure to see me at St. Louis in 1939.

Nelson Williams

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GYNECOLOGY—Two Weeks Course starting October 10th. Gynecological Pathology by Dr. Schiller starting October 24th.

OBSTETRICS—Two Weeks Intensive Course starting October 24th. Informal Course starting every week.

FRACTURES & TRAUMATIC SURGERY—Informal Course every week; Intensive Formal Course starting October 3rd.

DERMATOLOGY AND SYPHILOLOGY—Two Weeks Special Course starting September 19th. Clinical Course starting every week.

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a banquet held at the Intramural Sports Building at which Dr. Frederick G. Novy, Dean Emeritus of the Medical School, is to be speaker. On September 29 there will be a luncheon at which a round table discussion on the subject of Arthritis will be conducted by Dr. Walter Bauer and Dr. Richard H. Freyberg, Assistant Professor of Internal Medicine. At the luncheon on September 30 there will be a symposium on the subject of poliomyelitis. The reunion will be concluded on October 1 at the opening Convocation of the Medical School, at which time Dr. Peyton Rous of the Rockfeller Institute for Medical Research will be the speaker. On the afternoon of October 1 the football game between the University of Michigan and Michigan State College will be held.

A large attendance is expected. A series of interesting exhibits is being planned. There is to be entertainment for the wives and women guests and a general party is to be held at the Washtenaw Country Club on the evening of September 30.

Among Our Contributors

Dr. L. Byron Ashley is a graduate of the Detroit College of Medicine in 1914 and is Associate Surgeon on the staff of Harper Hospital, Detroit.

* * *

Dr. Clark D. Brooks is a graduate of the Detroit College of Medicine, 1905, and at the present is Surgeon on the staff of Harper Hospital, Detroit.

* * *

Dr. William R. Clinton is a graduate of the Detroit College of Medicine in 1911 and is Surgeon on the staff of Harper Hospital, Detroit.

* * *

Dr. Frederick Christopher was graduated from the Johns Hopkins Medical School in 1915. At present, he is Associate Professor of Surgery at the Northwestern University Medical School and Chief Surgeon at the Evanston Hospital, Evanston, Illinois.

* * *

Dr. Charles Gitlin was graduated from the University of Michigan Medical School in 1923. His interneship training was received at the Highland Park General Hospital. For two years thereafter he was assistant to Dr. Frank Suggs. In 1927 he pursued post-graduate course at the Laboratory of Surgical Technique and Augustana Hospital, Chicago, Illinois. Dr. Gitlin is a member of the surgical staff, out-patient division of the Highland Park General Hospital.

* * *

Dr. William A. Lange attended the University of Minnesota, where he received the degree of B.S., also B.A., and in 1934, M.D. He spent his internship at Receiving Hospital in Detroit, and at present is on the staff of Grace, Harper and Receiving Hospitals in Detroit. His practice is confined to plastic surgery.

IN MEMORIAM

James H. Greenwood, M.D.

Dr. J. H. Greenwood, of Detroit, died at his home on July 24. Dr. Greenwood was born in 1864 in Ontario. His early education was acquired at Ridgetown, Ontario, high school, following which he spent several years as a public school teacher. He entered upon the study of medicine at the Detroit College of Medicine, where he graduated in 1894. Dr. Greenwood was in general practice up to the time of his death. He is survived by his wife, Bessie; two sisters, Mrs. Albert Campbell, of Vancouver, and Mrs. William Gilbert, of Elkhorn, Manitoba; four brothers, Samuel, of Vancouver, Ben H., of Winnipeg, William, of Chatham, and Chalmers, of Stratford, Ontario. Dr. Greenwood was a member of the Wayne County Medical Society, the Michigan State Medical Society and the American Medical Association.

Richard Hayward Morgan, M.D.

Dr. Richard Hayward Morgan, of Detroit, died on July 10, 1938. Dr. Morgan was born June 28, 1881, in Albert Lea, Minnesota. He attended public school in Minneapolis and in 1908 he was graduated from the University of Michigan Medical School. He entered private practice in Detroit and in 1910 he became resident physician at Castle Springs Sanitarium in Arizona for two years. From 1912 to 1917 he was on the medical staff of the Equitable Life Insurance Company in Chicago. The ten years following this, he served on the staff of Mount McGregor Sanitarium in New York, specializing in diseases of the chest. In 1927 he took charge of the Extramural Consultation Service in Tuberculosis at Herman Kiefer Hospital. Dr. Morgan was also on the visiting staff of Harper Hospital and the Detroit Tuberculosis Sanitarium as well as maintaining his private practice. He was a member of the Wayne County, Michigan State and American Medical Associations, the National Tuberculosis Society and a former president of the Trudeau Society of Michigan. He leaves his wife, the former Eleanor Gillett of Bay City.

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PRACTICAL OTOLOGY, RHINOLOGY AND LARYNGOLOGY. By Adam Edward Schlanser, M.D., Colonel, Medical Corps, United States Army, Chief of the Eye, Ear, Nose and Throat Service, Letterman General Hospital, San Francisco, California; Former Director of the Department of Ophthalmology and Otorhinolaryngology, Army Medical School; and Chief of the Eye, Ear, Nose and Throat Section, Walter Reed General Hospital, Washington, D. C. Octavo, 315 pages, illustrated with 81 engravings. Cloth, $4.50, net. Philadelphia: Lea & Febiger, 1938.

This work emphasizes the clinical aspect of the subject. Only the essentials of otology, rhinology and laryngology have been included in the work. It is based on a large experience in the Medical Corps of the United States Army. Being brief, it is essentially a book for the general practitioner. It discusses special complications which he is likely to encounter. The text is well illustrated.

PNEUMONIA AND SERUM THERAPY: By Frederick T. Lord, M.D., Clinical Professor of Medicine, Emeritus, Harvard Medical School; Member of the Board of Consultation, Massachusetts General Hospital; Member of the Massachusetts Advisory Committee on Pneumonia, 1931-1935; and Roderick Heffron, M.D., Field Director, Pneumonia Study and Service, Massachusetts Department of Public Health, 1931-1935. Revised edition of Lobar Pneumonia and Serum Therapy. New York: The Commonwealth Fund, London: Humphrey Milford: Oxford University Press, 1938. Price, $1.00.

This work is particularly devoted to the treatment of lobar pneumonia by means of serum. In it is discussed the use of anti-pneumonococcic serum with special attention to clinical diagnosis, the selection of cases for treatment and identification of pneumococcus type. The author goes into detail in regard to technic of administration of the serum and he stresses the precautions to be observed in its use with possible reactions and their treatment.

ESSENTIALS OF PSYCHIATRY. By George W. Henry, M.D., Associate Professor of Psychiatry, Cornell University Medical College, New York, Attending Psychiatrist, The New York Hospital, New York. Third edition. Baltimore: The Williams and Wilkins Company, 1938. Price $5.00.

The necessity of treating the patient as a whole as well as his disease has been stressed to such a degree that the present work will be welcomed by those whose practice is concerned with the broad field of medicine or of surgery, as the case may be. There has been a long felt want for a work which gives the essentials of psychiatry in a plain way with the minimum of technical phraseology. In fact, a third edition within twelve years is evidence of the demand. The general practitioner will find here the information to help him handle incipient mental cases intelligently. While of value to the medical student and the non-specialist, the psychiatrist may find a work of fewer than five hundred pages somewhat elementary.

MEDICAL WRITING, THE TECHNIC AND THE ART. By Morris Fishbein, M.D., Editor, The Journal of the American Medical Association, with the assistance of Jewel Whelan, Assistant to the Editor. Press of American Medical Association, Chicago, 1938.

No book is of more value to a physician who is interested in transmitting his thoughts and observations to his colleagues than one on the art of preparing manuscripts for publication. This work by Dr. Fishbein is more than a revision of the earlier work by Fishbein and Simmons. Many sections are completely rewritten, and the extensive experience of the various editorial offices of the American Medical Association journals is incorporated. The technic of manuscript organization and preparation, suggestions on the preparation of illustrations and sections on grammar, spelling and abbreviation make up much of the subject matter. Often faulty and correct modes of expression are contrasted. Writers, particularly those who intend submitting articles to the Journal of the American Medical Association and the associated publications, will find the work a real help.

MEDICAL STATE BOARD QUESTIONS AND ANSWERS: By H. Max Goepp, M.D., formerly Professor of Clinical Medicine in the Graduate School of Medicine, Jefferson Medical College; formerly Assistant Visiting Physician, Philadelphia General Hospital; formerly Professor of Medicine, Woman's Medical College of Pennsylvania. Seventh Edition, Revised. 644 pages. Philadelphia and London: W. B. Saunders Company, 1938. Cloth, $5.50 net.

The concise answers to a multitude of questions on the basic sciences and clinical specialties, which have been culled from examinations of the National and several State Boards, are designed to aid the student in his preparation for these examinations. This new edition has been revised to include questions on the newer developments of medical science as well as to exclude obsolete material. Representative questions and answers cover the following fields: anatomy, physiology, physiologic chemistry, pathology, bacteriology, materia-medica and therapeutics, practice of medicine, surgery, obstetrics, gynecology, hygiene and medical jurisprudence.

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Table of Contents

Problems of Medical Care.
Henry Cook, M.D. 879

The Early Treatment of Mental Disorders.
Winfred Overholser, M.D. 883

The Lie Detector: Its History and Development.
John A. Larson, M.D., Ph.D. 893

The Medico-Legal Aspects of the Polygraph or "Lie Detector."
Lowell S. Selling, M.D., Ph.D. 897

Desensitization Treatment in Skin Diseases.
George L. Waldbott, M.D. 901

Management of Circulatory Failure.
Louis M. Warfield, M.D., F.A.C.P. 905

Punch Card Code for Classification of Cranio-cerebral Injuries.
Frederic Schreiber, M.D., and
Aage Nielsen, M.D. 909

Palliative Surgery in Carcinoma of the Stomach.
C. Fremont Vale, M.D. 912

Chronic Encephalitis.
Russell N. De Jong, M.D. 916

Acute Yellow Atrophy of the Liver Caused by Poisonous Mushrooms.
J. H. Ahronheim, M.S., M.D. 921

Editorial:
A Daniel Come to Judgment 924
Group Hospital Insurance 925
Dr. Luce, President 926
Dr. Corbus, President-Elect 926
Diet and History 927
A.M.A. House of Delegates Declares Policy 927

President's Letter 931

Department of Society Activity:
The 1938 Annual Session 932
Thank You 932
Michigan Sales Tax and Physicians 932
The Journal of the Michigan State Medical Society 933
Council and Committee Meetings 936
Executive Committee of the Council 936
Pros and Cons on Referendum of November 8 of Welfare Laws of 1937 937

Michigan's Department of Health 938

General News and Announcements 941

In Memoriam 950

The Doctor's Library 952

Among Our Contributors 953

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All communications relative to exchanges, books for review, manuscripts, should be addressed to J. H. Dempster, M.D., 5761 Stanton Avenue, Detroit, Michigan.

All communications regarding advertising and subscriptions should be addressed to William J. Burns, LL.B., Executive Secretary, 2642 University Avenue, St. Paul, Minnesota, or 2020 Olds Tower, Lansing, Michigan. Telephone 5-7125.

NOTICE TO CONTRIBUTORS

Owing to the limitation of space, preference will be given brief articles.

Manuscripts should be typewritten, double spaced, on one side of white paper 8½x11 inches. There should be a margin of 1½ inches on the left side of page. Do not send carbon copies; always submit the original typescript.

All photographs as illustrations should be clearly focused prints on glossy paper (do *not* send negatives). The standard 8x10 or 5x7 size prints are recommended.

All line drawings (charts, diagrams and sketches) are to be drawn with India ink on stiff white paper or Bristol board. Drawings are to be made with pen lines of suitable thickness to allow reduction to the width of one or two columns, as the case may be, of THE JOURNAL. Do *not* send drawings in colored ink.

Illustrations will not be accepted unless they reach a certain standard of excellence technically and present an attractive appearance. Illustrations, both photographs and drawings, are to be separate from the text. Each should be labeled on the back with the figure number, legend, title of paper and the author's name.

Reprints of papers published will be furnished authors if the order is placed at the time the galley proofs are returned to the editor. ***The cost of illustrations is to be defrayed by the author of the paper.***

Contributors are responsible for all statements, conclusions and methods in presenting their subjects. Their views may or may not be in agreement with those of the editor. The aim, however, is to allow authors as great latitude as the general policy of THE JOURNAL and the demands on its space may permit. The right to reduce in length, to alter by editing, or to reject any article is reserved. Articles are accepted for publication on condition that they are contributed solely to this JOURNAL.

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